

# Model of talent management for registered nurses in Malawian public hospitals



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**Orientation:** There exists a lack of research on a model illustrating the relationship between talent management and job satisfaction, innovative work behaviour, work engagement and career orientation, and it explains the significance of the present study.

**Research purpose:** This research aims to investigate the relationship between talent management and job satisfaction, innovative work behaviour, work engagement and career orientation amongst registered nurses in public hospitals of Malawi.

**Motivation of the study:** The development of a structured model will contribute to new knowledge in human resources management because no relationship of this kind exists. The model illustrates the interactive relationship between talent management, job satisfaction, innovative work behaviour, work engagement and career orientation.

**Research approach/design and method:** A quantitative research (cross-sectional) was conducted in public hospitals of Malawi by administering the adapted Human Capital Index Questionnaire, Minnesota Job Satisfaction Questionnaire (MSQ), the Innovative Work Behaviour Scale (IBS), the Utrecht Work Engagement Scale (UWES) and the Career Orientation Inventory (COI). The Spearman's rank correlation ( $r$ ) was used to determine the connection between the study variables.

**Main findings:** The results demonstrated a strong positive relationship between talent management and job satisfaction ( $r = 0.501, p < 0.001$ ) but a weaker relationship with innovative behaviour ( $r = 0.408, p < 0.001$ ), dimensions of work engagement (vigour, dedication and absorption) and career orientation ( $r = 0.488, p < 0.001$ ). Furthermore, the results showed that job satisfaction was strongly positively associated with innovative behaviour ( $r = 0.567, p < 0.001$ ), career orientation ( $r = 0.599, p < 0.001$ ) and work engagement. There was a constructive relationship between innovative work behaviour, work engagement ( $r = 0.631, p < 0.001$ ) and career orientation ( $r = 0.633, p < 0.001$ ). Career orientation was strongly associated with work engagement ( $r = 0.696, p < 0.001$ ).

**Practical/managerial implications:** Talent management impacts skill demands placed on the workforce for the kind of hired staff and how they are trained, assessed and rewarded. It also stimulates employees' job satisfaction, innovative work behaviour, work engagement and career orientation. This study highlights the need for hospital management to give proper attention to the effective implementation of talent management practices and strives to resolve the challenges of implementing those practices.

**Contribution/value-add:** This study offers the opportunity for health sector leaders to reflect on how they manage talent in hospitals, giving them the best practices of implementing talent management practices. Furthermore, there exists a lack of research illustrating the relationship between talent management and job satisfaction, innovative work behaviour, work engagement and career orientation. This explains the significance of this study.

**Keywords:** talent management; job satisfaction; innovative work behaviour; work engagement; career orientation registered nurses; public hospitals.

## Introduction

Talent management is one of the fundamental mechanisms that contribute positively towards job satisfaction, innovative work behaviour, work engagement, career orientation and retention of employees in organisations (Olusegun, Akinwale, & James, 2020; Tyskbo, 2019; Van Zyl, Mathafena, & Ras, 2017). Talent management thus significantly affects employees' job satisfaction, innovative work behaviour, work engagement and career orientations. Therefore, employees who are satisfied, engaged, creative and who have their career orientations in line with their jobs are

more likely to remain in the organisation than those who are not (Bawuro, Danjuma, & Wajjiga, 2018; Weal, Wells, & Oakman, 2018).

Generally speaking, poor service delivery in private and public sectors results from poor talent management (Kheirkhah, Akbarpouran, & Haqhani, 2016; Mohammed, Baig, & Gururajan, 2019; Whysall, Owtram, & Brittain, 2019). This negatively affects employees' satisfaction, engagement, innovative work behaviour and career orientation. Thus, a perceived lack of talent management practices such as training, growth and development, a proper reward system and a performance management system hinder innovative work behaviour that in turn affects the quality of services being offered (El Dahshan, Keshk, & Dorgham, 2018; Tash, Ali, Nowrouzi, & Maryam, 2016). Similarly, a perceived lack of talent management will result in a disengaged and dissatisfied workforce (Kamal & Lukman, 2017; Onday, 2016).

The public hospitals in most countries are riddled with crises; each year one out of five healthcare nurses leaves their job (Gabel-Shemueli, Dolan, & Suárez Ceretti, 2017). The reason can be attributed mainly to the difficult working conditions undermining nurses' welfare. Consequently, talent management is crucial for promoting nurses' welfare and boosting their retention. The retention of nurses is of great importance because they play a prominent role in delivering healthcare services, as they are obligated to provide quality essential services to the people (Abdul-Kareem, 2016; Ashe, 2018). Studies demonstrate that the perceived application of effective talent management practices may prevent skilled and experienced workforces from leaving the organisation (Noopur & Dhar, 2019; Ross, 2013; Salman & Taie, 2015; Wahba, 2015), and this holds for registered nurses in public hospitals.

Availability of quality public healthcare services is one of the key national priority areas for the Malawian government. It acknowledges that a healthy population is vital for achieving sustainable economic growth and development for the country (Malawi Development and Growth strategy III, 2018). Furthermore, the Malawian government also recognises that talent management of registered nurses is a crucial factor in ensuring that the healthcare system works towards the successful attainment of public health and quality of life (MDGs, 2018). The Malawian government has instigated various talent management strategies to retain and motivate health workers (Human Resource for Health [HRH], 2018; Health Sector Strategic Policy [HSSP] II, 2017–2022). Thus, various talent management strategies such as talent strategy, talent development, talent deployment, staffing, talent retention, talent acquisition, talent engagement, performance management and talent retention were implemented by the Malawian government through the Ministry of Health (HRH, 2018), in conjunction with numerous bilateral, multilateral partners and nongovernmental actors (HRH, 2018; HSSP II, 2017–2022). Studies emphasise that the sure way of achieving retention and motivation of employees is through effective talent management (Andrioti et al., 2017; Shulga & Busser, 2019).

Studies have established a growing realisation of the poorly developed scope and dearth of empirical studies on talent management (King, 2015; Mousa & Puhakka, 2019). Also, numerous studies on talent management were conducted in organisational contexts in the developed world (Crowley-Henry, Benson, & Al Ariss, 2018; Ingram, 2016; Schreuder & Noorman, 2019; Sinclair-Maragh, Jacobs-Gray, & Brown-Roomes, 2017; Stadler, 2011). There is thus little research on the same topic in African contexts (Barkhuizen, 2014; Mcube & Samuel, 2016; Plessis, Barkhuizen, Stanz, & Schutte, 2015). Moreover, there are increasing calls (e.g. Barkhuizen, 2014; Mcube & Samuel, 2016) for more research on talent management. Given this, it is evident that talent management, despite being researched in developed countries and some African countries, has not received much attention from academics and researchers in the Malawian context. Likewise, because the government of Malawi established talent management practices in public hospitals, it is not clear how talent management impacts job satisfaction, innovative work behaviour, work engagement and career orientation of registered nurses in public hospitals, particularly in the Malawian context.

This research proposes a model incorporating talent management, job satisfaction, innovative work behaviour, work engagement and career orientation. Research has shown that talent management's contribution to these constructs has positive benefits for employers, employees and the country. Absenteeism at work may reduce significantly, quality service delivery may increase and very few employees may want to leave the organisation (Almeida, Fernando, & Munoz, 2019; O'Connor & Crowley-Henry, 2017).

To this end, it is imperative to determine the relationship between talent management and the four constructs as it provides many insights. The study used and tested adapted instruments such as the Human Capital Index (HCI) questionnaire, Minnesota Job Satisfaction Questionnaire (MSQ), the Innovative Behaviour Scale, the Utrecht Work Engagement Scale (UWES) and the Career Orientation Inventory (COI). The instruments were verified within the Malawian context, the first of its kind. Subsequently, more information was gained to authenticate the adapted tools. Furthermore, the study is vital for answerability. It aids the thorough comprehension of nurses regarding the talent management practices being applied and holding their leaders accountable regarding how they should be initiated. In addition, the study is also essential for support as it helps develop and advance understanding of how reasonable talent management practices for nurses should be executed to promote best practices in public hospitals. The study also adds a new body of knowledge to talent management literature by incorporating human capital theory and two-factor theory from a positive perspective.

The article provides background on the connections between talent management, job satisfaction, innovative work behaviour, work engagement and career orientation, and a hypothesis is then formulated. After that, the study

sample, measuring instruments and statistical analysis are discussed. The results and discussion of each hypothesis set conclude the article.

## Theoretical background of the study

The study is premised on the human relations school of thought, contrary to the classical school of thought. The human relations school of thought views employees as key resources of the organisation, whilst the classical school of thought views employees as items and burdens (Dzimbiri, 2015). Thus, the study draws insights from the human relations school of thought, predominantly human capital theory and Herzberg two-factor theory separately, in elucidating talent management and its impact on job satisfaction, innovative work behaviour, work-engagement career orientation and the consequences thereof (Dzimbiri & Molefakgotla, 2021). Numerous scholars have employed the human capital theory (Becker, 1962) to scrutinise the relationship between human resources management practices and work outcomes (Dzimbiri & Molefakgotla, 2021). But Herzberg two-factor theory stresses the role of hygiene factors such as money, supervision, status, security, working conditions, policies and interpersonal relations in bringing job dissatisfaction, whilst motivator factors such as work itself, recognition, advancement and possibility for growth are associated with job motivation (Herzberg, 1966).

According to Tyskbo (2019), talent can be conceptualised as an employee's knowledge and skills that assist them in working and contributing to their organisations' success productively. As per Ariana, Soleimanib and Oghazianc (2018), talent is considered an individual's competence in an organisation that can be positively translated into more excellent performance and improved organisational outcomes. Obinna (2015) defined talent management as a process that encompasses four variables: talent identification, talent development, talent utilisation and talent retention. But Scullion et al. (2010) viewed talent management as the process of recruiting, involving, enhancing, retaining and deploying talents. Therefore, we can deduce that talent management involves applying systematic interrelated activities effectively within the organisation to yield a competitive advantage.

From the human capital theory perspective, when organisations value the employees, they will invest in them, and in return, employees will remain in the organisation forever (Tarique & Schuler, 2010). The writers argue that organisations that employ talent management practices positively are believed to subscribe to the human relations school of thought that advocates that employees are a vital resource amongst all the resources within the organisations. Studies demonstrate that talent management practices that focus on talent development could be theoretically illuminated by human capital theory (Dickmann, Sparrow, & Brewster, 2008; McDonnell, 2009; Tarique & Schuler, 2010). According to Renaud, Morin, Saulquin and Abraham (2015), the human capital theory intends to illustrate crucial

decisions an organisation or individual makes regarding rationally managing employees.

In the same way, Herzberg (1966) stressed that if the motivational factors are attained, the worker gets motivated, performs better and stays in the organisation. Factors that genuinely motivate employees to serve and inspire them to remain in organisations are aspects of the job that are considered intrinsic. They include achievement, recognition of good performance, advancement and career growth opportunities (Dzimbiri, 2018). The writers argue that applying talent management practices provides hygiene and motivator factors to employees to inspire and motivate them to stay in the organisation.

## Talent management practices

Oladapo (2014) emphasised that talent management has five main categories: recruitment, performance, performance management, succession planning, training and development and retention. He further pointed out that each of the five elements plays an imperative role in the talent management framework (Oladapo, 2014). The Human Capital Institute (HCI) in 2011 recognised the scope of talent management as having nine categories, such as talent strategy, staffing, talent acquisition, the talent review process, talent development, talent engagement, performance management, talent deployment and talent retention (Dzimbiri & Molefakgotla, 2021 in HCI [2011]). Thus, the study adopted the Human Capital Institute's scope of talent management to determine the relationship between talent management and job satisfaction, innovative work behaviour, work engagement and career orientation amongst registered nurses within the public hospitals, because the HCI's definition appears to be more comprehensive and systematic.

## Job satisfaction

Kahiga (2018) defined job satisfaction as the sum totals of emotions, feelings, views and beliefs that people hold of their present jobs. This implies that job satisfaction involves employees' states of mind and attitudes at their workplaces. When employees have a favourable attitude towards their jobs, it is a sign of job satisfaction, and when they develop an unfavourable attitude towards their jobs, it indicates job dissatisfaction. According to Sinclair-Maragh et al. (2017), job satisfaction is imperative in an organisation because there are many negative consequences associated with job dissatisfaction. Amongst others, these include a lack of loyalty, an increased number of accidents and increased absenteeism. Sinclair-Maragh et al. (2017) listed three essential features of job satisfaction that the organisation needs to consider. Organisations are to make sure that human values guide them to prioritise treating employees equally and with respect. In this sense, an analysis of job satisfaction can serve as a good gauge of worker effectiveness (Sinclair-Maragh et al., 2017). Job satisfaction and talent management have been broadly studied globally (Awan & Muhammad, 2016; Hamidi, Saberi, & Safari, 2014; Kamal & Lukman, 2017; Tash, Ali, &

Ahmadzede, 2016). The outcomes demonstrate that talent management considerably affects job satisfaction, whilst correlation analysis reveals that talent management positively correlates with employees' job satisfaction in various contexts. Unfortunately, this relationship between talent management and job satisfaction, despite being an important area for academic inquiry, has not received much attention from academics and researchers in a Malawian context, particularly the health sector.

## Innovative work behaviour

Bian and Wan (2019) viewed innovative behaviour as actions that look for, advance and apply new ideas and resolutions in current conditions. This implies that engaging in creative behaviour at the individual and organisational levels is essential because the individual level may influence organisational changes (Stoffers, Hendrikx, Habets, & Van der Heijden, 2020). On the other hand, innovative work behaviour is a considered effort on the part of individuals to create new ideas, promote these ideas and realise their application to benefit the teams and organisations (Yasir & Majid, 2019). Ingram (2016) pointed out that organisations can promote innovative behaviour amongst their employees by implementing effective human resources practices. There is a need to establish a conducive environment that stimulates learning in many organisations. Training and development are said to contribute significantly to innovative behaviour amongst other human resources practices. Employees can gain new skills, competencies and attitudes and thus enhance their innovation behaviour (Ingram, 2016). Studies have shown that creative work behaviour is essential for organisational productivity and success (Moll & De Leede, 2017; Pedraza, Mesa, & Gaviria, 2016; Yasir & Majid, 2019). Unsurprisingly, existing literature reveals a growing and increasing relationship between talent management and innovative behaviour (Asurakkody & Young, 2018; Bawuro et al., 2018; Khaki, Khanzadeh, & Rad, 2017; Shu-pei, 2018). Those studies show that talent management positively contributes to employees' innovative work behaviour. However, little is known on how talent management influences innovative work behaviour in a Malawian context, particularly in the health sector.

## Work engagement

Employee engagement concerns the emotional and intellectual commitment that employees may have towards an organisation (Kuburović, Dedić, Djuričić, & Kuburović, 2016). It is worth observing that employee engagement is different from other constructs such as job involvement and organisational commitment because employee engagement has many-dimensional constructs. This means that employees can be emotionally, cognitively or physically engaged.

Isa and Ibrahim (2014) propounded that engaged employees are usually enthusiastic and participate fully in their assigned job responsibilities. A survey by Human Resources Management (2015) concluded that implementing effective

talent management for all employees would result in employee engagement, thereby improving performance and customer satisfaction and reducing turnover and absenteeism. Baran and Sypniewska (2020) asserted that employee engagement has three aspects or dimensions: efficacy (dedication), vigour and absorption. Vigour concerns high stages of energy and mental flexibility when undertaking work, willingness to devote effort to ones' job and the ability to persevere in times of difficulties. On the other hand, dedication concerns the emotional side of work engagement and the willingness of workers to apply ample time and effort to doing something meaningful. Furthermore, absorption is when employees can be fully absorbed and can concentrate well whilst doing a job (Baran & Sypniewska, 2020).

Numerous studies have focused on the global relationship between talent management and work engagement. The results demonstrate a significant correlation between talent management practices and employee engagement. However, specific links between talent management and work engagement have not been sufficiently established empirically amongst registered nurses in public hospitals. No known studies have determined these links in the Malawian context.

## Career orientation

According to Rojewski et al. (2019), career orientation is viewed as the values articulated and plans made by an employee that have bearing on job-related choices. This implies that career orientations represent employees' preferences on specific job-related prospects, settings and kinds of work. Studies demonstrate that employees whose personal career orientations match their jobs will attain more positive career results than those who lack such congruence (Arar & Oneren, 2018; Redondo, Sparrow, & Hernandez-Lechuga, 2019). Literature also suggests that employees' career orientation could reduce turnover intentions when talent management is effectively implemented in an organisation (Arar & Oneren, 2018; Redondo, Sparrow, & Hernandez-Lechuga, 2019).

In healthcare facilities, nurses play a prominent role in delivering healthcare services, as they are obliged to provide quality essential services to the citizenry (Isfahani & Boustani, 2014; Mitchell & Esnard, 2014; Onday, 2016). Thus, it is paramount that hospital managers align registered nurses' career orientations with their present jobs by implementing talent management effectively (Isfahani & Boustani, 2014). Substantial research studies have been conducted on the relationship between talent management and career orientation in the global context (Arar & Oneren, 2018; Redondo, Sparrow, & Hernandez-Lechuga, 2019; Wang, Zhao, Liu, & Pan, 2019). Those studies showed a correlation between talent management and employee career orientation. However, it is unclear how talent management impacts career orientation, particularly within the Malawian context.

The preceding paragraph leads to the following hypotheses for this study (see Figure 1).

Where:

- H1:** There is a productive relationship between talent management and job satisfaction.
- H2:** There is a constructive relationship between talent management and innovative work behaviour.
- H3:** There is an effective relationship between talent management and work engagement.
- H4:** There is a productive relationship between talent management and career orientation.
- H5:** Job satisfaction is constructively related to innovative work behaviour.
- H6:** Job satisfaction is constructively related to career orientation.
- H7:** There is a constructive relationship between creative work behaviour and work engagement.
- H8:** There is a productive relationship between creative work behaviour and career orientation.
- H9:** Career orientation is constructively related to work engagement.

## Research methodology

### Population and sample

This study focused on registered nurses in the four public hospitals of Malawi. A multistage cluster sampling technique and purposive sampling techniques were used separately to select public hospitals in various districts of Malawi. According to Saunders (2016), a multistage cluster sampling technique involves taking a series of cluster samples. The purposive sampling technique selected the four leading public hospitals because they had more significant numbers of registered nurses than other hospitals (Ministry of Health, 2018). The respondents for each hospital were selected using a simple random sampling technique where every participant had an equal opportunity to be selected. Through the Cochran formula (1963), a sample of 947 was drawn from a population of 8334, at a 95% confidence level and marginal error of 3%. A total of 947 participants were administered to respondents over a year (2020).

### Data collection

This study used primary data. Self-administered questionnaires were used to collect the preliminary data, namely an adapted version of the HCI, the short form of the MSQ, the Innovative Work Behaviour Questionnaire (IWBQ), the UWES and the COI questionnaire.

The HCI tool was used to measure talent management. The index consisted of 45 items, measuring the 9 talent management practices: strategy, the talent review process, staffing, talent acquisition, performance management, talent engagement, talent development, talent deployment and talent retention. Previous studies found acceptable internal consistencies for the shortened version of the Talent Mindset Index, ranging from 0.73 to 0.87 (Barkhuizen & Stanz, 2010). Several studies in South Africa have confirmed

this instrument's reliability (Barkhuizen & Stanz, 2010; Hirschfield, 2000).

The MSQ form measured job satisfaction. Minnesota Job Satisfaction Questionnaire comprises 20 items (1 per aspect), segmented into intrinsic and extrinsic job contexts. Various studies have revealed conventional internal consistencies for the short form of MSQ to be at least 0.80, signifying good internal consistency (Buitendah & Rothman, 2009; Hirschfield, 2000). All items were presented with a five-point Likert scale with responses ranging from 1 (never) to 5 (always).

The IWBQ, developed and validated by Jeroen and Hartog (2010), was used to measure innovative work behaviour. The scale consists of nine items with a high Cronbach's alpha value of 0.87, demonstrating good internal consistency. The scale measures creative work behaviour, using its four dimensions as items of idea exploration, idea generation, idea championing and idea implementation, which collectively measure IWB (Janseen & Yperen, 2014). Idea exploration was measured with two items, idea generation with three items, idea championing with two items and idea implementation with three items. The UWES measured work engagement. This measure comprises 17 items measuring three subscales, which are vigour (6), dedication (5) and absorption (6). Preceding studies found acceptable internal consistencies for the UWES to be generally higher than 0.80 (Duran, Extremera, & Rey, 2004; Montgomery, Peters, Schaufeli, & Den Ouden, 2003; Schaufeli & Bakker, 2004). Moreover, confirmatory factor analysis (CFA) showed that the three-factor structure of the scale (vigour, dedication, absorption) was superior in terms of fit to a one-factor structure (engagement). The COI (Schein, 1985) measured career orientation. The measure comprises 41 items. Various studies have discovered internal consistencies for COI to be 0.89, indicating good internal consistency (Buitendah & Rothman, 2009; Hirschfield, 2000). The respondents indicated how talent management impacts career orientation on a five-point scale from 1 (never) to 5 (always).

### Management of data

The collected data were manually coded, cleaned and captured in an Excel spreadsheet before being brought into the Stata version 16.1 statistical software for analysis. Data summaries were generated to produce frequencies tables, bar graphs and percentages. The data were analysed through the Stata software. The measuring instrument's reliability was determined through the Cronbach's alpha coefficients tool. The validation of the study was confirmed by CFA using structural equation modelling. The adequacy of the sample was confirmed using the Kaiser–Mayer–Oklin (KMO) measure of sampling adequacy as a requirement for conducting CFA. The factorability of the correlation matrix was checked using Bartlett's test of sphericity. Spearman's rank correlation ( $r$ ) was utilised to determine the connection between the study variables (Weinberg & Abramowitz, 2016).

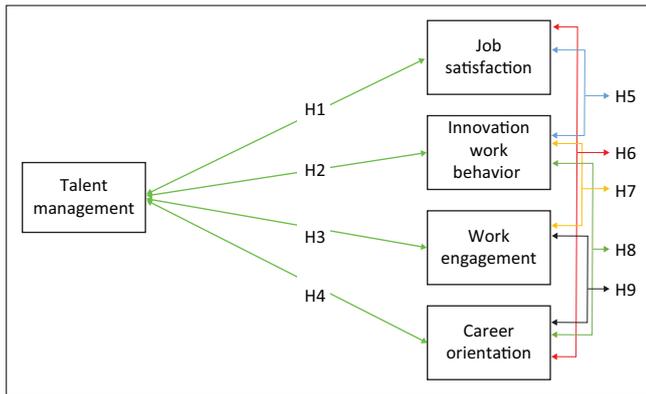


FIGURE 1: A hypothesised model for the study.

## Ethical considerations

Ethical clearance to conduct this study was obtained from the Ethics Committee of the Faculty of Economic and Management Sciences (EMS-REC) at North-West University (reference number: NWU-00579-20-A4) and the National Committee on Research in the Social Sciences and Humanities (NCRSH) in Malawi. The directors of designated public hospitals in Malawi were approached for approval through their Research Ethics Committees, before conducting the research. Before the survey, participants were assured that the purpose of the study was purely academic. Respondents were assured that their participation in the study was voluntary and that they were free to discontinue their involvement without consequences. Furthermore, participants were given a consent form before completing their questionnaires. Participants' details, such as names and organisations, were not captured to preserve and guarantee anonymity and confidentiality. Questionnaires were distributed randomly by giving them out by hand after a comprehensive explanation of the purpose of the research.

## Results of the study

### Demographic information

Out of the 947 registered nurses who participated in the study, over half (66.6%) were female, implying that the nursing profession is still female dominated. A total of 42.2% nurses were between 25 and 30 years of age, meaning that young adults dominate the trade, and 53.8% were married. Most nurses were educated up to diploma level (55.6%), implying that more nurses are required to upgrade to a degree level. In all, 44.8% were in middle management and 55.2% had less than 6 years of work experience.

### Reliability analysis

Before conducting exploratory factor analysis, sample adequacy and sphericity were examined using the KMO test. In contrast, Cronbach's alpha coefficient test was used to test for the reliability of the items for all four instruments. The measures for sampling adequacy for the impact of talent management on job satisfaction, innovative work behaviour, work engagement and career orientation in Table 1 ranged from 0.927 to 0.978. These measures were more significant

TABLE 1: Reliability, validity and sampling adequacy for talent management, job satisfaction, innovative behaviour, work engagement and career orientation.

Factor	No. of items	Cronbach's alpha	Bartlett's test of sphericity		Kaiser-Meyer-Olkin	
			Chi-square	Degrees of freedom		
Talent management	45	0.977	19295.958	990	< 0.0001	0.978
Job satisfaction	20	0.943	6720.306	190	< 0.0001	0.951
Innovative work behaviour	9	0.922	3292.958	36	< 0.0001	0.927
Work engagement	17	0.95	7301.962	136	< 0.0001	0.946
Career orientation	41	0.974	17236.322	820	< 0.0001	0.972

than 0.6. Hence, items under the five factors were adequate (Cheung, 2013; Gliner et al., 2011). Moreover, reliability for HCI, MSQ, IBS, UWES and career orientation measures in Table 1 were 0.977, 0.943, 0.922, 0.950 and 0.974, respectively, hence they were considered to have excellent reliabilities (Cheung, 2013).

Spearman's rank correlation ( $r$ ) was used to determine the connection between the study variables. The results in Table 2, indicated a strong positive relationship between talent management and job satisfaction ( $r = 0.501, p < 0.001$ ) but a weaker relationship with innovative work behaviour ( $r = 0.408, p < 0.001$ ), dimensions of work engagement (vigour, dedication and absorption) and career orientation ( $r = 0.488, p < 0.001$ ). This entails that a change in one of the aspects of the variables will lead to a positive change in the other aspects of other variables (Healey, 2014).

The results in Table 3 show that job satisfaction was strongly positively associated with innovative behaviour ( $r = 0.567, p < 0.001$ ), career orientation ( $r = 0.599, p < 0.001$ ) and work engagement (including its dimensions). Based on Weinberg and Abramowitz's (2016) guidelines for interpreting correlations, a robust, constructive relationship between innovative work behaviour and work engagement was shown ( $r = 0.631, p < 0.001$ ) and between innovative work behaviour and career orientation ( $r = 0.633, p < 0.001$ ). Career orientation was strongly associated with work engagement ( $r = 0.696, p < 0.001$ ).

## Discussion

The research aims to determine the relationship between talent management, job satisfaction, innovative work behaviour, work engagement and career orientation. The results are discussed following the hypothesis set.

**H1:** There is a constructive relationship between talent management and job satisfaction.

The study results in Table 2 demonstrated a significant positive correlation between talent management and job satisfaction ( $r = 0.501, p < 0.001$ ). Hence, the study hypothesis was accepted because various studies show that talent management correlates positively with employee job satisfaction in multiple contexts (Awan & Muhammad, 2016; Hamidi, Saberi, & Safari, 2014; Kamal & Lukman, 2017; Tash et al., 2016). This calls for the management of public hospitals

**TABLE 2:** Correlation between dimensions of work engagement, talent management, innovative work behaviour, job satisfaction and career orientation.

Dimensions	Talent management	Job satisfaction	Innovative work behaviour	Work engagement			Career orientation
				Work vigour	Work dedication	Work absorption	
Talent management	1	-	-	-	-	-	-
Job satisfaction	0.501*	1	-	-	-	-	-
Innovative work behaviour	0.408*	0.567*	1	-	-	-	-
Work vigour	0.473*	0.598*	0.627*	1	-	-	-
Work dedication	0.380*	0.593*	0.600*	0.604*	1	-	-
Work absorption	0.444*	0.594*	0.571*	0.730*	0.650*	1	-
Career orientation	0.488*	0.599*	0.633*	0.633*	0.589*	0.682*	1

\*, Significant at 0.001.

**TABLE 3:** Correlation between work engagement, talent management, innovative work behaviour, job satisfaction and career orientation.

Dimensions	Talent management	Job satisfaction	Innovative work behaviour	Work engagement	Career orientation
Talent management	1	-	-	-	-
Job satisfaction	0.501*	1	-	-	-
Innovative work behaviour	0.408*	0.567*	1	-	-
Work engagement	0.489*	0.659*	0.631*	1	-
Career orientation	0.488*	0.599*	0.633*	0.696*	1

\*, Significant at 0.001.

to strengthen the effective implementation of talent management strategies in public hospitals of Malawi.

**H2:** There is a constructive relationship between talent management and innovative work behaviour.

The study results in Table 2 showed a weaker positive significant relationship between talent management and innovative work behaviour ( $r = 0.408, p < 0.001$ ). Hence, the study hypothesis was accepted because studies on talent management and innovative work behaviour reveal a growing and increasingly significant relationship between talent management and creative behaviour (Carter, 2017; Khaki et al., 2017; Obinna, 2015; Vetrovic & Kuffel, 2016). There is thus a need to foster effective talent management practices amongst nurses in public hospitals.

**H3:** There is a constructive relationship between talent management and work engagement.

The study results in Table 2 demonstrated a significant positive relationship between talent management and work engagement ( $r = 0.489, p < 0.001$ ). Thus, the study hypothesis was accepted because considerable studies show that there is a significant contribution between talent management practice and employee work engagement (Anlesinya, Amponsah-Tawiah, & Dartey-Baah, 2019; Ariana et al., 2018; Asiamah, Mensah, & Azinga, 2019; Chien & Yick, 2016; Naz & Sharma, 2017). Consequently, there is a need to continue with effective talent management practices in public hospitals to advance work engagement levels amongst the nurses.

**H4:** There is a constructive relationship between talent management and career orientation.

Table 2 showed a significant positive relationship between talent management and career orientation ( $r = 0.488, p < 0.001$ ). This implied that registered nurses confirmed that

talent management practices contributed to their career orientation. The study hypothesis was accepted because considerable research studies correlate talent management and career orientation (Arar & Oneren, 2018; Redondo, Sparrow, & Hernandez-Lechuga, 2019; Wang, Zhao, Liu, & Pan, 2019). Management of hospitals should therefore strive to foster effective talent management practices in public hospitals to enhance the career orientations of nurses.

**H5:** Job satisfaction is positively related to career orientation.

The study results in Table 3 showed a strong positive relationship between job satisfaction and career orientation ( $r = 0.599, p < 0.001$ ). The study hypothesis was accepted because the literature suggests a significant relationship between job satisfaction and career orientation (Tomei & De Campos Serra, 2017).

**H6:** Job satisfaction is positively related to work engagement.

The study results in Table 3 showed that job satisfaction is positively associated with work engagement ( $r = 0.659, p < 0.001$ ). Therefore, the study hypothesis was accepted because the literature suggests a positive relationship between work engagement and job satisfaction (Garg, Dar, & Mishra, 2017).

**H7:** There is a constructive relationship between innovative work behaviour and work engagement.

The results in Table 3 show a positive relationship between innovative work behaviour and work engagement ( $r = 0.631, p < 0.001$ ). The study hypothesis was accepted because studies show the relationship between creative work behaviour and work engagement (Soatantyo & Ardiyanti, 2018).

**H8:** There is a constructive relationship between innovative work behaviour and career orientation.

Table 3 showed a positive relationship between innovative work behaviour and career orientation ( $r = 0.633, p < 0.001$ ). The study hypothesis was accepted because the literature suggests an association between creative work behaviour and career orientation (Yuan & Li, 2019).

**H9:** Career orientation is positively related to work engagement.

The results in Table 3 show that career orientation is positively associated with work engagement ( $r = 0.696, p < 0.001$ ). The study hypothesis was accepted as the literature highlights a positive relationship between career orientation and work engagement (Coetzee & Villiers, 2010; Wahba, 2015).

## Theoretical implication

This study contributes to the understanding of talent management practices on job satisfaction, innovative work behaviour, work engagement and career orientation of registered nurses in Malawi's public hospitals. Limited studies have been conducted, and the research provides additional awareness about this occurrence. The study advances an understanding of how registered nurses become satisfied and engaged and have their career orientation needs met with the existing talent management practices within the public hospitals of Malawi, thus adding new knowledge in human resource management regarding talent management and its impact on job satisfaction, innovative work behaviour, work engagement and career orientation.

## Implication for policy and practice

Talent management has implications for skill demands placed on the workforce regarding the kind of hired staff and how they are trained, assessed and rewarded. It impacts employees' job satisfaction, innovative work behaviour, work engagement and career orientation. Therefore, hospital leaders should give proper attention to effective talent management. Furthermore, the results will inform best practices for the public hospital management because they would appreciate the importance of talent management and provide solutions to the challenges affecting the proper implementation of the strategies, thereby advancing and promoting how talent management strategies should be implemented to support best practices in public hospitals.

## Limitations and suggestions for future research

The study employed a cross-sectional survey design, limiting the survey in producing cause and effect inferences over a long period. Furthermore, the study was conducted in public hospitals, particularly central ones. The findings cannot be generalised to other private and public hospitals. The other constraint regarded the units of study, which focused on registered nurses only. This deprived the study of obtaining different views from other health workers such as doctors, hospital administrators, clinicians and dentists. Further research on talent management and its impact on job satisfaction, innovative work behaviour, work engagement and career orientation amongst doctors is suggested.

## Conclusion

Talent management is imperative for job satisfaction, innovative work behaviour, work engagement and career orientation, thereby reducing voluntary attrition levels of nurses. This study provides evidence about the relationship between talent management and job satisfaction, innovative work behaviour, work engagement and career orientation in the workplace. The study concluded a robust positive relationship between talent management and job satisfaction but a weaker connection with innovative behaviour, work

engagement and career orientation. Implementing talent management practices that would improve job satisfaction, creative work behaviour, work engagement and career orientation in Malawian hospitals may be necessary to improve quality health services ultimately.

## Recommendations

This study has made the following recommendations for government and management in hospitals:

1. Management of public hospitals should be devoted to talent management by ensuring that talent management systems of public hospitals are rooted in their strategic plans. Moreover, there is need for government to commit adequate resources such as funding to strengthen talent management systems.
2. There is also need for management of public hospitals to make sure that the execution of talent management practices is carried out appropriately and methodically to spur positive perceptions of nurses towards their application.
3. There is need for government to make better interventions to foster effective talent management practices for health workers, particularly registered nurses, to enhance their job satisfaction, innovative work behaviour, work engagement and career orientations.

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

## Authors' contributions

G.L.D. was involved in the conceptualisation, methodology, data collection, analysis of the study, writing, review and editing. M.A.M. was involved in supervision and review.

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## Data availability

The data are put in such a way that names of the respondents are not disclosed, hence the use of accession codes. Two figures include the raw data and there is no restriction on data availability.

## Disclaimer

The views and opinions expressed in this article are those of the authors and do not necessarily reflect the official policy or position of any affiliated agency of the authors.

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