INNOVATIVENESS AND TURNOVER INTENTIONS AMONGST CONTINUOUS LEARNERS IN GAUTENG

BY

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ABSTRACT

Innovation is crucial in organisational survival; employees are critically important in managing and facilitating innovative ideas. Organisations simultaneously endeavour to retain employees, attributable to the increasing turnover rates that organisations are currently experiencing. A lack of studies on literature and studies identifying how turnover intentions can be influenced by innovative work behaviour in a South African context, with an important cohort of professionals, stressed by work, family and studies. Turnover intentions and innovative work behaviour are increasingly crucial for organisations in today's competitive environment, this study tests theories predicting the extent to which innovative work behaviour influences turnover intentions in certain conditions. Theory predicting certain moderating effects is also tested to determine if the relationship between innovative work behaviour and turnover intentions is weakened or strengthened, influenced by various factors. Provided theory predicting the mediating effects of job satisfaction and perceived supervisor support on the relationship between individuals' innovation and turnover intentions was investigated. The sample for this study comprised of employed professionals assuming degree classes on an evening programme at the University of the Witwatersrand, whilst operating in various companies within industries the Gauteng Province. This study uses a questionnaire as a mode of data collection. Structural equation modelling was used to analyse collected data and determine the relationships between the variables. Findings identified a significant relationship between innovative work behaviour, turnover intentions, core self-evaluations and turnover intentions of employees. This study found perceived supervisor support and job satisfaction as significant mediators in the relationship between innovative work behaviour and turnover intentions. The value of this study derives from the potential of findings from this research to advance the literature concerning this topic, specifically in the South African context where inadequate studies investigated the proposed relationships. This study may assist organisations by ensuring innovative employees are retained within organisations while adequately managing employees' turnover intentions.

Key words: Innovative work behaviour, turnover intentions, employment satisfaction, perceived supervisor support, core-self-evaluations, distributive justice.

DECLARATION

I, the undersigned, _____, hereby declare that this research is my own, unaided work. It was submitted in fulfilment of the requirements for the degree of Master of Commerce at the University of the Witwatersrand, Johannesburg. It has not been submitted before for any degree or examination in this or any other university.

I further declare that:

- I am aware that plagiarism (the use of someone else's work without their permission and/or without acknowledging the original source) is wrong.
- I have followed the required conventions in referencing the thoughts and ideas of others.

SIGNED AT _____ON THIS THE 29th DAY OF MARCH 2019.

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Judite Adriano

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LIST OF ABBREVIATION AND ACRONYMS

AVE	Average Value Explained
CFI	Comparative Fit Index
AMOS	Analysis of Moments Structure
EFA	Exploratory Factor Analysis
MAR	Missing at Random
PANAS	Positive and Negative Affect Schedule
SEM	Structural Equation Modelling
RMSEA	Root Mean Square Error of Approximation
CMIN/d.f	Minimum discrepancy/ degrees of freedom
NFI	Normed Fit Index
TLI	Tucker Lewis Index
GFI	Goodness-of-Fit Index
AGFI	Adjusted Goodness-of-Fit Index
SPSS	Statistical Package for the Social Sciences
SRMR	Standardised Root Mean Square Residual
TAM	Technology Acceptance Model
TLI	Tucker Lewis Index
WDQ	Work Design Questionnaire

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CHAPTER 1

INTRODUCTION

INTRODUCTION

Chapter 1 introduces the background and outlines the structure of this study. Thereafter, the research problem and purpose are identified and clarification is provided on how achieving the research objectives contributes to current literature and practice.

1.1   BACKGROUND OF THE STUDY

According to Boss (2018), employee turnover is reportedly the highest in a decade globally. Organisations simultaneously experience the challenge of remaining competitive in a globalised economy and are required to engage in a continuous process of innovation, regardless of industry (Mytelka, 2000). As a result, various trends surfaced, such as globalisation, advances in technology and a shift to a knowledge-based economy, making it imperative for organisations to retain their employees and their knowledge. Globalisation and uncertainty in environments pressured organisations to observe employees who can achieve job requirements and surpass normal work behaviours through continuous innovation (Janssen, 2000). Globalisation is the growing interdependence amongst various economies concerning their fiscal growth, technology, culture and politics as knowledge spreads (Czenter, Esther, Shaker & Waechter, 2002).

In addition, as companies transition from being industry to knowledge-based, there is a growing dependency on their ability attract individuals with mandatory talent and qualifications (Niederman, Sumner & Maertz, 2007). Additionally, organisations began to concentrate on how employees can be retained, attributable to the shifts in the economy and demographic changes (Dhanpat, Modau, Lugisani, Mabojane & Phiri, 2018). According to Callaghan (2016a), in the knowledge economy, it is the skills and knowledge of an employee at the centre of organisational success. Human resources management encountered implications, attributable to the various dynamics in the knowledge economy.

For the past two decades, emphasis was on retaining employees within organisations. This was perceived as a critical issue (Arif, 2018, Mayfield & Mayfield, 2007). Attributable to the consequence's organisations encounter when employees intend to resign from their organisation, such as a decrease in productivity and work ethic, researchers and organisations concentrated on employee turnover (Arif, 2018). Employers commenced to observe their employees as great value to the organisation, inspiring organisations to find ways to ensure

they do not lose these employees as assets, buffering the costs associated with recruiting and selecting new employees (Kesen, 2016).

Organisations are facing the challenge with a knowledge loss threat, encountering global issues of recession and staff turnover (Makhubela & Ngoepe, 2018; Martins & Martins, 2011). According to Levy (2011), knowledge retention became organisations' main challenge therefore, it is critical to establish and understand the dynamics concerning turnover intentions to retain employees and their knowledge in an effective manner.

Frank, Finnegan and Taylor (2004) established that lost knowledge was the greatest impact of employee turnover. A need exists to retain knowledge of employees within organisations (Bender & Fish, 2000). Lost knowledge, attributable to employees leaving an organisation, did not provide sufficient focus (Martins & Martins, 2011). Resigning employees leave with their individual knowledge and valuable information concerning strategies and secrets of trade, projecting the organisations implements, including possible confidential data (Karwirwa, 2015; Pickett, 2004). It is imperative for organisations to discover and gain knowledge on how employees with critical knowledge can be retained.

South Africans are reportedly ranked amongst the five most hardworking workforces globally, by the Organization for Economic Cooperation and Development (OECD). There is a need for constant knowledge and information to retain this population in their respective organisations. The knowledge and skills of an employee are crucial for an organisation to remain competitive (Asimah, 2018; Kyndt, Dochy, Michielsen, Moeyaert, 2009). It is imperative for organisations to gain an understanding of what leads employees to desire to resign for adequate programmes to be developed to reduce their intentions (Khan & Du, 2014).

According to Van der Westhuizen (2014), there is less transferability associated with specific human capital, comprising tacit knowledge and formal training, distinctive to a specific setting. Various consequences are associated with an employee's decision to resign. Organisations need to endeavour to avoid these situations.

Tacit and explicit knowledge were established as vital in innovation (Hall & Andriani, 2003). Innovation was established to redesign the competitive environment, creating innovative market opportunities (Leal-Rodríguez, Leal-Millán & RoldánSalgueiro, 2013). DeLong (2004) emphasises that the loss of employees with the knowledge required to develop and generate ideas, can reduce innovation within an organisation. The loss of knowledge and experience

provides the opportunity for competitors to poach employees (Makhubela & Ngoepe, 2018; Martins & Martins, 2011). Innovation relies on knowledge availability (Du Plessis, 2007).

An increase in dependence on the ability of employees has to motivate organisations to be innovative (Niesen, Van Hootegem, Vander Elst, Battistelli & De Witte, 2018).

Simmonds (1986) defined innovation as a basic creative process and new ideas, comprising various products and services, new ways of using the existing products in organisations and discovering new markets that can consume existing products. Innovative work behaviour refers to individuals engaging in idea generation, promotion and implementation (Scott & Bruce, 1994).

Retention remained a priority in organisations and has proved to be a challenging task amongst organisations attributable to evidence showing that it is harder to retain employees than it is to gain them (Casademunt, 2016; Tymon, Stumpf & Smith, 2011). Employers provided prominence to the recruitment and attraction of talent and have to an extent-neglected issues concerning retaining acquired talent, which will generate challenges for organisations in future (Schmidt, 2016). It is imperative for organisations to gain insight on possible solutions to prevent employees from leaving an organisation. This study endeavours to contribute to the knowledge concerning the topic, assisting employers in adequate retention of talent within their respective organisations.

Increasing uncertainty in the economy resulted in employees' need to improve their skills (Bakan, 2000; Schmidt, 2017; Tanaka, 2018). Employees who take responsibility for their own learning, such as those embarking on continuous learning in the form of part-time studies whilst working, have the potential to assist organisations in their goal to increase performance whilst simultaneously improving their professional competence; employers should strive to retain this cohort.

Similarly, innovation was observed to become a crucial talent across countries and industries. For organisations to sustain a higher level of performance in environments, it is imperative to become more innovative and able to identify further opportunities (Shalley, Zhou & Oldham, 2004). Innovation is essential in determining growth in future and the survival of organisations.

According to Tohidi and Jabbari (2012), innovation is crucial to the success of organisations. As a result, the authors pose that organisations commence to prioritise innovation as a concern

seeing that it is amongst the most complex concerns that organisations experience. Innovation participates in managing the turbulence occurring in the external sphere of the organisation, whilst sustaining a firm's competitive advantage and improvement of performance (Huang & Huarng, 2015). In addition to innovation, another real concern for organisations is the number of employees who choose to resign, and the impact this has for organisations. Innovative work behaviour and turnover intention are important to an organisation, requiring further investigation.

This study will test theory, predicting the relationship between individuals' innovativeness and turnover intentions and under which conditions it could have a negative influence on retaining individuals through exploring the mediating and moderating functions of variables in the relationship.

1.2   CONTINUOUS LEARNING

Changes in society occur rapidly, leading to organisations continuously adapting to technologies and information (Bowers, 2013; Van Breda-Verduijn & Heijboer, 2016). As a result, employees require skills and a level of adaptability to encounter the changes that occur in the workplace and learn continuously.

According to Nagpal (2017), continuous learning is the expansion of skills and developing future opportunities through the acquirement of knowledge and competencies. Individuals often continuously learn in attempts to reach their full potential and develop at a personal and professional level.

Over the past years, there was an increase in the need for continuous learners within organisations as it was identified as aiding organisations in remaining competitive (Maurer & Weiss, 2010; Neese, 2017). The need for employees to continuously acquire new skills and progress professionally became critical to the success of employees' careers (Hall & Mirvis, 1995; Maurer & Weiss, 2010).

As a result, it is imperative to understand how self-motivated individuals to continuously gain knowledge, can be retained within organisations as they have a critical function in contributing to its ability to remain competitive, contributing to organisational efficiency through their adaptability of societal changes.

1.3   RESEARCH PROBLEM AND PURPOSE OF THE STUDY

A research problem is a clearly stated area of concern that prevails in theory that suggests a need for significant understanding and investigation (Labaree, 2009). The research purpose refers to a statement that provides the reason why the study is undertaken (Beckingham, 1974).

The background presented evidence on the consequences of turnover and lack of innovation amongst employees within an organisation. Employees who choose to resign has been proved to be costly and have an impact on organisations (O'Connell & Kung, 2007). Organisations encounter a global challenge of effectively retaining their employees and their knowledge (Arokiasamy, 2013). In addition, innovation became a crucial factor that enables organisations to adapt to rapid changes arising in the economy and gain competitive advantage. There is a dearth of insight on innovation at an individual level, which is knowledge required for organisations to generate strategies in alignment with the behaviour of its employees (Bos-Nehles, Renkema & Janssen, 2017). Organisations find themselves in a time of unmatched persistent change from the environment and amongst employees. Organisations are required to be innovative to meet the demands placed on organisations to succeed. Knowledge is a critical factor in the innovation process employees' part in generating, promoting and implementing ideas, was outlined. A need for further insight into the reasons that employees desire to resign and a need to contribute to minimal knowledge exist concerning relationships between individuals' innovation and turnover intentions.

According to Farh, Hackett and Liang (2007), the culture and various institutional factors in several countries may influence the strength and direction of associations that exist with employee outcomes. Employee turnover can differ concerning country, economy, society and industry and the employee rank (Carsten & Spector, 1987; Saeed, Waseem, Sikander & Rizwan, 2014). It is imperative that employee turnover is investigated across various contexts to gain insight into how the various factors differ in various contexts. Carsten and Spector (1987) suggest that outcomes concerning turnover relationships may differ across countries and cities as there is a variation from one society and economy to another.

Furthermore, the study was motivated by the call for more strategies to be developed, aiming to improve retaining employees, attributable to the limited literature in the South African context relating to whether innovative work behaviour influences whether an employee remains in an organisation.

It is imperative to detect the various factors that prompt individuals to desire to resign from their organisations as an effective way to reduce the turnover rates being experienced by various organisations and investigate how these relationships may differ in the South African context (Carmeli, Gilat & Weisberg, 2006).

1.4   RATIONALE FOR THE INCLUSION OF VARIABLES

The various components of the model tested in this study are based on social exchange theory that states that social exchange is a series of interactions which in exchange generates obligations for an employee such as to stay in an organisation or be innovative in exchange. Theory holds that there are various factors that influence the quality of social exchanges and an individual will reciprocate actions received from an organisation. Theory suggests that relationships can only be fostered in ideal conditions (Xerri & Brunetto, 2013).

According to Jepsen and Rodwell (2007), a lack of clarity exists concerning employees responding cognitively and behaviourally to their insights of workplace relationships. The components of the model were introduced to identify channels that could potentially reduce the threat of innovative employees choosing to resign from an organisation. Literature suggests that these include the level of satisfaction with the job, support from supervisors and human characteristics (Cropanzano & Mitchell, 2005; Jepsen & Rodwell, 2007; Osman, Noordin, Daud & Othman,2016). Continuous learners are to a certain extent committed to advancing their careers, which makes it important for organisations to retain these individuals.

Core-self-evaluations were tested in this study attributable to the importance they have, as some individual evaluations may differentiate employees concerning their performance (Arshad, 2014; Kacmar, Collins, Harris & Judge, 2009). In addition, core-self-evaluations may have moderating influences in the prediction of turnover intentions (Chhabra, 2018; Javed, Abrar, Bashir & Shabir, 2014). Furthermore, individuals with higher self-evaluations might have higher confidence in their abilities and may be more likely to resign under certain conditions (Chhabra, 2018). Also, the perceptions an employee has about distributive fairness may impact the relationship between innovative work behaviour and turnover intention. Furthermore, South Africa is a country known for the high levels of diversity and for being a complex filled society (Mazibuko & Govender, 2017; Naidoo, 2015). As a result, there is skewness concerning the opportunities accessed by various individuals. Clarity in concerning the proposed

relationships would differ in situations where an individual had a historical experience of disadvantage and if it would be different across gender.

According to Janssen, Van de Vliert and West (2004), there was an emphasis on the benefits that innovative work behaviour has for organisations and little focus on the negative effects that may lead to deceptive inferences. Shih and Susanto (2011) indicate that a factor left unexplored in studies, involved innovative work behaviour and how it could potentially create problems for organisations. A minimal understanding concerning the degree to which the structure of theory predicted relationships that were tested in this study persists over time.

It was evident that further knowledge regarding the relationship that innovative work behaviour has on turnover intentions of employees was required. Furthermore, in a contemporary South African context of part-time learning these relationships have seemingly not been sufficiently studied, which is a limitation to organisations concerning the function and how innovation impacts certain organisational outcomes. This study aims to test theory predicting the relationships between individual innovative work behaviour and turnover intentions amongst employees. Through these relationships, insight may be provided that will inform the retention strategies that organisations employ in the various South African industries.

The purpose of this study is to obtain further insight into the relationships discussed to enable organisations to formulate adequate innovation strategies that catered for the possible effects that innovative work behaviour may have on the turnover intentions of an employee.

1.5   RESEARCH QUESTIONS AND OBJECTIVES

A research objective can be regarded as an active statement about how the study will answer the research question and what the researcher expects to achieve through a study (Farrugia, Petrisor & Farrokhyar, 2010). The objective of the study was to test theory relating the various variables, including innovative work behaviour and turnover intentions, testing whether the various moderating and mediating factors and an individual's propensity to be innovative, significantly predict an employee's turnover intention. The main objective was to create insight through testing to provide human resources professionals with recommendations specifically tailored to effectively manage retention of innovative individuals. Insights considered the impact it may have on employees' turnover intentions which will assist organisations in adequately managing their turnover rates. The research questions derived from this objective

are now presented. The hypotheses are derived in the literature review section but are summarised here.

1. *To what extent does innovative work behaviour influence turnover intentions?*

   Hypothesis 1 is derived from the research question above.
   H1: There is a significant association between innovativeness and turnover intentions amongst continuous learners.

2. *To what extent does job satisfaction and perceived supervisor support mediate the relationship between innovation and turnover intentions among learners?*

   Hypotheses 2 and 3 are derived from the research question above.
   H2: Perceived Supervisor Support mediates the relationship between individuals' innovation and turnover intentions amongst continuous learners.
   H3: Job Satisfaction mediates the relationship between innovativeness of an individual' and turnover intentions amongst continuous learners.

3. *To what extent do core self-evaluations influence turnover intentions among continuous learners?*

   Hypothesis 4 is derived from research question 3.
   H4: There is a significant association between core-self-evaluations and turnover intentions amongst continuous learners.

4. *To what extent do perceived distributive justice, core self-evaluations, experiential variables and type of work moderate the relationship between innovativeness and turnover intentions among continuous learners?*
   The following hypotheses are derived from this research question.

   H5: Perceived distributive justice moderates the relationship between individuals' innovation and turnover intentions amongst continuous learners.
   H6: Core-self-evaluations moderate the relationship between individuals' innovation and turnover intentions amongst continuous learners.
   H7: Age moderates the relationship between individuals' innovation and turnover intentions amongst continuous learners.

H8: Gender moderates the relationship between individuals' innovation and turnover intentions amongst continuous learners.

H9: Education moderates the relationship between individuals' innovation and turnover intentions amongst continuous learners.

H10: Tenure moderates the relationship between individuals' innovation and turnover intentions amongst continuous learners.

H11: Type of work moderates the relationship between individuals' innovation and turnover intentions amongst continuous learners.

Theoretical model of the tested relationships is therefore illustrated in Figure 1.1. The model reflects the relationships between the various variables in the study, which include innovativeness, turnover intentions and the various contextual factors. Individuals' innovativeness and the various contextual factors will be treated as the independent variables, whilst turnover intentions are the dependent variable in this study.
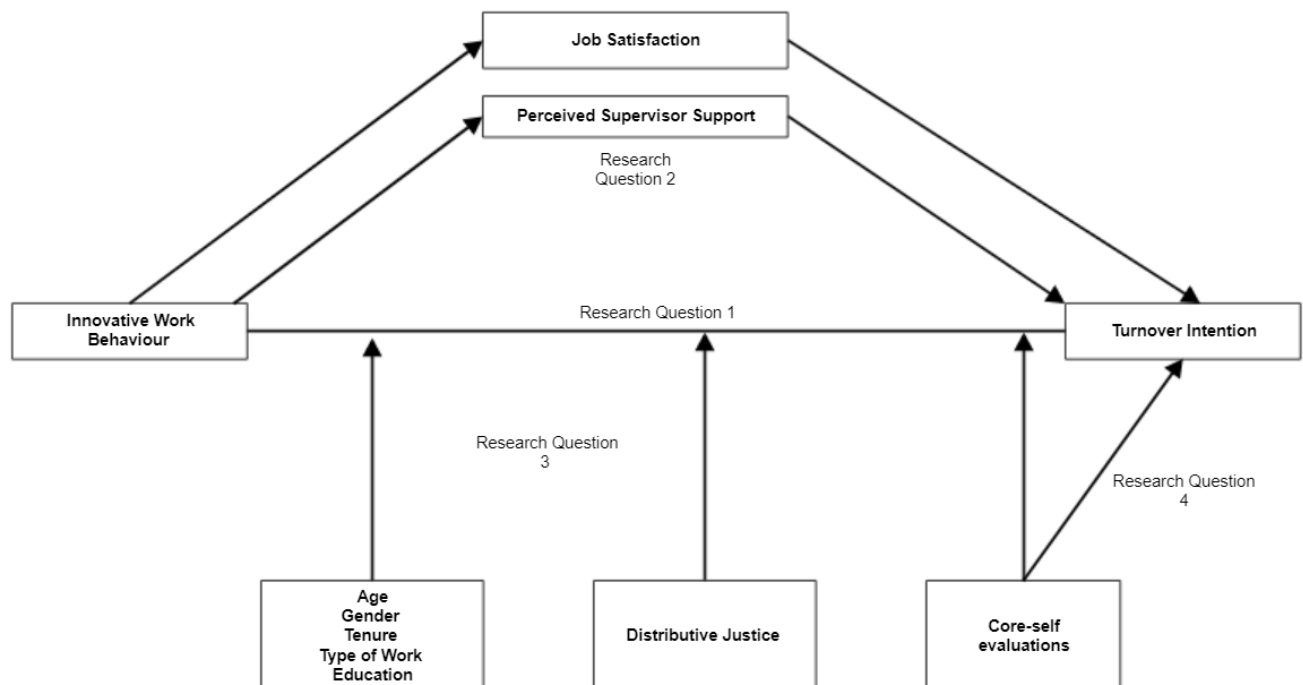
Figure 1.1: Theoretical Model

The following section outlines the need and potential influence that this research may have on literature, organisations and the general contribution of this study.

1.6 SIGNIFICANCE OF THE STUDY

There is limited literature regarding findings of the proposed study in a South African context; therefore, this study contributes to the limited literature that currently exists about the relationships between the various variables. According to Holtom, Mitchell, Lee and Eberly (2008) there needs to be an improved global focus on the turnover, as most literature centres on research conducted in a non-African context and the field would profit from the expansion of studies to a global level. This is a convergence that this study hopes to contribute. This study contributes to literature in a South African context; there is lack of previous studies on the topic.

In addition, this study proposes the opportunity to analyse the moderating and mediating function of variables and the impact of variables on turnover intentions. The results of this study may partake in assisting organisations to effectively manage individuals' innovation considering the influence it may have on employees' decision to either stay or resign which may result in the making of adequate provisions for turnover.

Human resources practitioners across organisations may be encouraged to advance the current mechanisms put in place to retain employees within their various organisations. Furthermore, findings from this research may expand the knowledge concerning turnover intentions which is critical for practitioners to gain insight on how to devise strategies with the aim of reducing the turnover rates that organisations encounter today.

In current literature, there is a shortage in research that deals with the outcomes of innovative behaviour (Janssen, Van de Vliert & West, 2004). Findings of this research may encourage human resources practitioners to focus on innovative employees who were established to crucial in the survival of competitive organisations across industries. Organisations are incentivised to develop adequate approaches and retention strategies to ensure that innovative employees as assets do not leave their current organisations.

The literature established that this topic has continued to be under-researched, especially in a South African context. Studies appear to be mostly based on non-African countries, revealing a gap in the literature. A skewness exists in research concerning the impact of innovativeness

on various organisational outcomes, including turnover intentions, with most research focussing on the positive impact of innovativeness on an organisation.

The increase in uncertainty in today's economy has increased the need for improvement in knowledge and skills and continued education as means of achieving competitive advantage (Annunziata & Bourgeois, 2018; Maric, Barisic, & Jurjevic, 2012; Noel & Qenani, 2013). Employees taking responsibility for their own learning, furthering their knowledge and improving their skills, have the potential to assist organisations in achieving their goals to increase performance, whilst simultaneously improving their professional competence.

The loss of a learner after the completion of a degree may serve as a loss to organisations as the knowledge and skills they acquire will be lost alongside the employee as learning forms part of competitive advantage for organisations (Van Breda-Verduijn & Heijboer, 2016).

In summary, this research intended to contribute in filling the emphasised gaps that exist in the current literature concerning the topic. The failure to conduct such a research will leave the current literature with a gap relating to findings and established conclusions, lacked global context and input. This would result in South African organisations potentially applying and using Western countries' findings as a guideline in the strategies they facilitate which may not be a true depiction of the South African context, as it varies in multiple ways when compared to other countries. Ultimately, the concern relating to retaining human capital would continue to increase instead of decrease if the right strategies are not put in place to manage turnover and associated costs.

1.7 LOCATION OF RESEARCH

Table 1.7-1 Summary South African Literature

TURNOVER INTENTIONS STUDIES IN A SOUTH AFRICAN CONTEXT				
Authors	Variables	Sample	Methodology	Findings
Dhanpat, Modau, Lugisani, Mabojane & Phiri (2018)	employee retention and turnover intentions a	call centre employees, Insurance industry, Johannesburg N=282	Quant; SPSS, Multiple regression analysis	• Supervisor support to be critical in retention of employees
Muteswa & Ortlepp (2011)	management style, rewards and work life balanced, turnover intentions	Managerial-level personnel in KwaZulu-Natal and made use of MBA students, N=106	SPSS	• Potential turnover consideration was influenced by leadership style

Baker & Coetzee (2015)	career anchors, organisational commitment and turnover intention	South African retail sector, N = 343	a cross-sectional quantitative research approach, correlational and stepwise regression analysis	• entrepreneurial creativity-anchored individuals tended to have low organisational commitment and high turnover intention
Storm (2015)	cognitive engagement, job satisfaction and job performance, turnover intention.	IT professionals in South Africa, N=105	Multiple regression	• Job satisfaction was a determinant of turnover intention. • Job satisfaction completely mediated the effect of attention on turnover intention.
Martin & Roodt, (2008)	organisational commitment, job satisfaction, turnover intentions	South African tertiary institution, N=367	Structural equation modelling and step-wise linear regression.	• Correlation found between Turnover Intentions and Job Satisfaction
Naidoo, (2017)	pay satisfaction, job satisfaction, organizational commitment, and turnover intentions.	IT professionals, N=158	descriptive, correlation and regression analysis	• Organizational commitment and job satisfaction found to be vital predictors of turnover intentions • Partially mediated the influence of pay satisfaction on turnover intentions
Ncede (2013)	job satisfaction, turnover intentions	Cape town clothing industry, N=198	Correlations	• Negative correlations between turnover intention and • Positive relationship between turnover intention and perceptions job mobility
Williamson & Holmes (2015)	job embeddedness, organizational commitment, turnover intentions	Large multi-national resource company, N=79	longitudinal design, Hierarchical regression analysis	• Job embeddedness had a positive relationship on organizational commitment and a negative relationship on turnover intentions. • Moderation by employees' cultural values
Chauvet (2016)	employees' emotional intelligence, job satisfaction, work engagement, turnover intention	five volunteering organisations, Durban area, N = 274	SEM	• Job satisfaction had a significant effect on the turnover intention
Takawira, Coetzee, & Schreuder (2014).	job embeddedness, work engagement and turnover intention	of academic and non-academic staff in a South African higher education institution, N= 153	correlational analyses, Multiple regression analyses	• Correlational analyses revealed significant relationships between job embeddedness, work engagement and turnover intention.

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				• Organisational links and dedication significantly and negatively predict turnover intention.
Theron, Barkhuizen & Du Plessis (2014).	turnover and retention	Academics in 13 higher education institutions, N= 153	Descriptive statistics, EFA	• Over half the respondents indicated slight to strong dissatisfaction with compensation and performance management practices
Schlechter, Syce & Bussin (2016)	demographic characteristics, voluntary turnover	general insurance company, N=2592	Logistic regression analysis	• Predictors of turnover were found to be: age, years of service, cost centre, performance score and the interaction between number of dependants and years of service
Oosthuizen, Coetzee & Munro (2016).	work-life balance, job satisfaction and turnover intention	permanently employed salaried employee's IT company, N=79	Regression analysis	• Negative and negative work-home interaction significantly predicted job satisfaction and turnover intention • Job satisfaction also significantly predicted turnover intention.
Van der Westhuizen (2014)	Turnover intention, employee engagement	audit firm's financial services industry, N=391	SEM	• Negative impact of employee engagement on turnover intention
Rijamampianina (2015).	employee turnover rates, organizational performance	N=83	multiple linear and nonlinear regression	• Voluntary employee turnover rate significantly predicted financial and organizational performance through a cubic function.
Singh (2016).	Job Satisfaction, Turnover Intentions	Engineers, Gauteng province, N=10	a qualitative study	• Level of job satisfaction plays a significant role in turnover intentions
Pienaar & Bester (2011)	Burnout, intention to quit/change.	professional nurses Free State region, N=563	Analysis of variance	• The highest levels of Emotional Exhaustion and Depersonalization and the lowest levels of Personal Accomplishment displayed a higher degree of intention to quit/change
Rispel, Chirwa & Blaauw (2014)	Moonlighting, intention to leave	South African nurses,N=3784	multiple logistic regression	• Moonlighting is a predictor of intention to leave

Blaauw, Ditlopo, Maseko, Chirwa, Mwisongo, Bidwell, Normand (2013)	job satisfaction, intention to leave	health workers Tanzania, Malawi, and South Africa. 2,220 health workers, 564 from Tanzania, 939 from Malawi, and 717 from South Africa	Multiple regression	• Statistically significant differences in job satisfaction and intention to leave between the three countries. • Job satisfaction is statistically related to intention to leave.
Dhurup, Keyser & Surujlal (2015).	psychological contract, violation of the psychological contract and work-related anxiety, intention to quit	sport coaches, Gauteng province, N=151	regression analysis	• Violation of the psychological contract and work-related anxiety of sport coaches predict intention to quit.
Robyn & Du Preez, (2013).	intention to quit	Generation Y academics between the ages of 20 and 30 years at six HEIs in South Africa, N = 189	correlation analysis, regression, structural equation modelling (SEM) and partial least squares path modelling (PLS).	• Employee engagement, job satisfaction, remuneration, reward, recognition and transformational leadership were significantly related to intention to quit.
Sojane, Klopper, & Coetzee (2016)	leadership, job satisfaction, intentions to leave	RNs in medical-surgical units in both private and public hospitals, N = 204	Pearman's rank order correlations, t-tests, Cronbach's alpha	• A relationship between leadership and job satisfaction was found • A relationship between intention to leave and job satisfaction was found
Lukoto & Chan, (2016)	Innovative Organisational Culture, Employee Innovative Work Behaviour	departmental managers, N=92	Correlation analysis Hierarchical regression analysis	• Job autonomy, resources and strategy resource influence employee innovative work behaviour
Krog & Govender (2015).	servant leadership, employee empowerment, commitment, trust, innovative behaviour	project team members comprising project managers, business analysts and IT staff, N= 48	structural equation modelling and path analysis	• Persuasive mapping has the strong impact on employee innovative behaviour, followed by employee commitment
Monji, & Ortlepp, (2011)	levels of trust, job satisfaction, employees' intention to leave the organisation.	company producing bread, Johannesburg, N=91	Descriptive statistics and Pearson product-moment correlations.	• Statistically significant relationship was found between organisational trust and employees' intention to leave
Potgieter & Snyman (2018)	personal factors on job retention	South African banking sector employees, N= 262	Regression analysis	• Personal factors as a composite variable to predict the talent retention factors of job characteristics, supervisor support, career opportunities, and work/life balance.

Jackson & Jackson (2019).	self-esteem perceived discrimination, employee intentions to quit, affective organisation commitment.	N= 414	Structural Equation Modelling	• Low self-esteem scores predicted high intention to quit due to perceived work-place discrimination.

The table above summarises some of the studies concerning turnover intentions within the South African context of the past few years. The studies investigated various predictors of turnover intentions. Innovative work behaviour was investigated as an outcome variable in separate studies. Authors investigated mediation and moderation in separate studies without integration. This study integrated innovative work behaviour, job satisfaction, perceived supervisor support, core-self-evaluations, distributive justice and various demographic variables to explain turnover intentions within the South African context, which is a theoretical contribution; minimal research was conducted in an African context, integrating the mentioned factors in one study. This study investigates potential mediators and moderators of the direct relationship, which brings a degree of complexity and new insight into a model predicting turnover intentions.

Concerning methodology, this study uses structural equation modelling, identified through limited studies, as indicated above. Majority studies were established to use regression analysis in the hypothesis.

Concerning the sample, this study offers a contributory sample, providing new insight into turnover intentions with the use of employed professionals also undertaking degree classes on an evening programme. Studies were conducted with the use of specific industries which have most commonly been in higher education, nursing and amongst IT professionals. This study will use respondents that fall across various industries within South Africa, which expands the scope of industries that were used in the investigation of turnover intention.

According to Preacher and Hayes (2008), multiple mediation is a design that received minimal attention, recommending researchers to consider the possibility of mediation by multiple variables within a study. Preacher and Hayes explain the unlikeliness that the transmission of an effect by an independent variable can solely be conveyed by one means. This study offers and considers multiple mediation, which is a contribution to literature that currently exists and an addition to the research designs that were used in related studies.

As discussed above, there are divergences in the literature that currently exist concerning the proposed study. This study contributes to literature relating to innovative work behaviour and turnover intentions by establishing if a relationship exists within a South African context. There is dearth of literature within an African context as literature was conducted in countries within a Western context and it cannot be stated with certainty that the relationships established can be generalised to an African context. Furthermore, findings of this study offer data that comes from a variety of industries and with a use of a unique sample of working professionals pursuing studies on a part-time basis. Also, various studies investigated various predictors of turnover intentions and authors have continued to contribute to the knowledge and literature that currently exist. This study contributes and adds to the literature, investigating innovative work behaviour as a significant predictor of turnover intentions of employees.

Based on the summary of the conducted literature, a divergence was identified concerning the context in which the relationships were investigated. With most studies being conducted in non-African countries, the need for literature that contributes to knowledge of the dynamic of these relationships in African countries arises. This study can add to current literature with input of how these relationships differ in a South African context. Findings support what majority of literature has established in other countries, which is a negative relationship between core-self-evaluation and turnover intentions. Thus, this study contributes to the consistency of findings that currently exist in literature in discussion of the relationship that exists between innovative work behaviour and turnover intentions of employees.

Also, this study adds value to literature with findings of mediators in the relationship between innovative work behaviour and turnover intentions. Perceived supervisor support and job satisfaction were investigated as independent variables when investigating the effect, they have on the turnover intention of employees. This study adds to literature by investigating the mediating effects of the variables in the proposed relationship and contribute to findings that offer a different context in which the research was conducted in comparison with what currently exists in literature.

1.8   CHAPTER SEQUENCE

This dissertation comprises six chapters; the paragraphs below provides a brief description of what each chapter will entail.

Chapter 1: Introduction

Chapter 1 presents the background of the study, the research problem, questions and objectives. The chapter discusses the significance of the study and giving the justification for the inclusion of the various factors in the study. This chapter establishes the study concerning literature that exists on turnover intentions. Studies close to the area of the current study were identified to analyse what was done, the potential limitations of previous studies and how this study aims to expand on knowledge that currently exists. In summary, this chapter presents and justifies the need for this study to be conducted and the potential contribution it offers to both theory and practice.

Chapter 2: Literature Review

Chapter 2 presents a review of literature. The following variables are defined: turnover intentions, innovative work behaviour, job satisfaction, perceived supervisor support, distributive justice, core-self-evaluations and the effects of various demographic variables. Furthermore, this chapter will derive the hypothesis to be tested in the current study. Thus, this chapter aims to identify inconsistencies and gaps that currently exists in literature concerning the topic and further place the research in the context of what currently exists in literature and further present the contribution the study will make based on the recommendations of previous studies.

Chapter 3: Research Methodology

Chapter 3 discusses the research methodology employed in the study. This includes the paradigmatic location of the research. This chapter considers the ontology, epistemology, human nature and methodological that paradigms are characterised by. Also, this chapter will elaborate on the design for the research and provide justifications into why it is appropriate for the current study. Included in the research design will be a discussion concerning the population and sample for the current study the criteria that will be used for sampling and the confidence level of testing to be followed in the study.

This chapter reveals information concerning instrumenting various factors included in the study and provide information concerning the scales such as reliability reported in previous studies. Following this, procedures that the researcher is to follow for data collection will be outlined and discuss how the research will deal with concerns concerning reliability and validity.

The research methodology chapter will provide an in-depth account on the data analysis procedures from data entry to actual testing of hypothesis. Furthermore, the steps to be followed in structural equation modelling will be provided. In addition, the ethical considerations that the researcher will be mindful of throughout the research are to be outlined in this chapter. Lastly, the methodological limitations concerning the study will be identified.

Chapter 4: Results

Chapter 4 presents the data findings and analysis. There is an interpretation and report on the statistical analysis and the research hypothesis is statistically tested in this chapter. This chapter will begin with the presentation of the descriptive statistics which will include the demographic profile of the respondents and provide the mean and standard deviations for each of the measurement scales. This chapter will proceed to discuss how the data in the study was screened for missing data, unengaged responses. Also, this chapter will proceed to conduct both exploratory factor analysis and confirmatory factor analysis. Prior to constructing the causal model, this chapter will include the tests for the multivariate assumptions.

In addition, Chapter 4 presents the result of the hypothesis to be tested. This will include the test for the direct relationship between innovative work behaviour and turnover intentions and proceed to present the results of both the mediation and moderation hypothesis. Lastly, this chapter will conclude with a summary of the results and outline which of the derived hypothesis were supported and which were not supported in the study.

This chapter has a further section that conducts further statistical analysis which will include the presentations into issue concerning common method bias, critical ratios tests outcomes, differences tests, three-way interaction and moderated mediation tests.

Chapter 5: Discussion

Chapter 5 entails the discussion of findings provided in Chapter 4. This chapter re-examines the research questions and objectives of the study that were established. This chapter will review the demographic profile of the respondents and discuss the outcome of each hypothesis individually. This chapter will discuss how the results established in this study relate to literature that currently exists and whether it supports or contradicts what was established by the authors when compared to a South Africa context. This chapter identifies areas for further

research and potential implications for managers, which will then be further elaborated on in the concluding chapter.

Also, this chapter will discuss findings that were unexpected and related findings that were established from the further statistical analysis conducted which may serve as a reference for future studies.

Chapter 6: Conclusion

Chapter 6 will begin with an overview of all the chapters that were presented in this dissertation leading to the concluding chapter. This chapter will proceed to present the implications the study will have for theory and for practice. Like any research, this chapter identify the limitations of the study. Furthermore, this study will outline the contributions of the study and potential directions for future research.

1.9   CONCLUSION

An overview of the study was provided in this chapter. It began with the introduction and background of the study which provided insight into why the variables presented in this study are important in today's knowledge economy and the impact it has on organisations. Thereafter; the research problem and research questions were outlined. The aims and objectives were presented in addition to theoretical framework of the study. In addition, this chapter has discussed the significance of the study and motivated the use of the various variables in the study.

This chapter locates the research to the context of what was conducted in current literature concerning turnover intentions and provided insight into what differentiates this study from what has already been done concerning the topic. Studies close to the area of the current study were identified to analyse what was done, the potential limitations of previous studies and how this study aims to expand on knowledge that currently exists and. This chapter concluded with an overview of the chapters that the dissertation entails and the content each chapter provides and the sequence to be followed throughout the dissertation.

The following chapter concentrates on the literature review and on this basis elaborates on the hypotheses.

CHAPTER 2

LITERATURE REVIEW

This chapter comprises a literature review on the core themes of importance to the study. The purpose of this literature review is to outline the current inconsistencies and gaps in the literature concerning innovative work behaviour and turnover intentions in addition to the various associated variables. This chapter reviews theory linking the variables under study, predicting relationships.

Each construct included in the study is discussed, followed by discussion of relationships between the several constructs, which leads to the derivation of the hypothesis for each of the relationships. Literature relating to turnover intentions is now observed.

2.1 EMPLOYEE TURNOVER

Boroş and Curşeu (2013) reveal that over the past two decades, turnover research increased, and employee turnover was identified as being a costly issue organisations are currently encountering attributable to the economic and psychological costs associated with the problem. In a time of tough competition, turnover of employees is observed as a worrying issue (Saeed, Waseem, Sikander & Rizwan, 2014). Organisations endeavour to reduce the rate of turnover in attempts to save the associated costs associated.

Allen (2008), defined turnover as the act of an employee leaving the organisation for any of various reasons. According to Dhanpat, Modau, Lugisani, Mabojane and Phiri (2018), employee turnover can be defined as the organisation's incapacity to retain an employee.

Turnover can be categorised into voluntary and involuntary forms (Iqbal, 2010; Price & Mueller, 1981). Voluntary turnover occurs when an employee independently decides to resign for various reasons that may include the monotony of their tasks at work. On the other hand, when the employer, usually for fair causes, dismisses an employee it is involuntary turnover with deficient performance as a main reason.

According to Shaw, Delery, Jenkins and Gupta (1998) when employees initiate the turnover process it is regarded as voluntary turnover and there is an indication of substantial loss of human capital that employers should try and avoid as they are often employees most desirable to be retained by the organisation. In voluntary turnover, employers are prone to losing their employees talent (Óskarsdóttir, 2015). On the other hand, when the employer initiates the turnover process it is considered involuntary turnover and often includes deficient performers within the organisation (Saraih, Aris, Sakdan & Ahmad, 2016).

Turnover was identified as a persistent issue within organisations regardless of industry and size (Yin-Fah, Foon, Chee-Leong & Osman, 2010). It is imperative for organisations to understand the motives that lead to employees intending to leave the organisation to counteract turnover through proactively employing strategies to restrict turnover rates and retain employees within organisations (Chan & Morrison, 2000; Haynie, Harris & Flynn, 2016; Van der Westhuizen, 2014).

2.1.1 Consequences of Turnover

According to Dhanpat, Modau, Lugisani, Mabojane and Phiri (2018), there are serious implications associated with the investment of resources in human capital. It is important to view employees as assets attributable to the investment organisations put into human capital. As a result, employees that possess knowledge specific to an organisation are an indispensable asset to an organisation attributable to their potential to create a competitive advantage (Carmeli & Weisberg, 2006). For organisations to sustain their competitive advantage, it is imperative that employees are retained (Dhanpat, Modau, Lugisani, Mabojane & Phiri, 2018).

According to Naidoo (2018) turnover eradicates the organisation's return on invested capital from a productive employee. Furthermore, Naidoo emphasises the effect that turnover has on the operations within an organisation. Employees and the entire company are affected by the loss of competent and qualified employees (Van Staden, 2017). Also, in addition to the direct costs associated with the turnover of employees there are indirect costs related to turnover (Biron & Boon, 2013). There is often low morale, loss of productivity and an increase in workload for employees who remain within the organisation (Clever, 2013).

Thus, individuals and organisations are impacted by an employee's decision to resign from their organisation (Mbah & Ikemefuna, 2012). According to Iqbal (2010), operations and dynamics in organisations are often disrupted by both forms of turnover. Furthermore, there are various costs that can be associated with both forms of turnover and these can either be financial or non-financial (Iqbal, 2010).

According to Allen (2008), there are three significant reasons why turnover is crucial to employers. These include costly turnover; turnover influences the organisation's performance and the scarcity of qualified employees. Achoui and Mansour (2007) affirm that the turnover conclusion can be negative. Negative results include costs concerning recruiting, selecting and training individuals and intangible costs associated with the effect turnover has on workload.

Additionally, Narayanan (2016) emphasises the various effects that employee turnover may have on the organisation. Organisations could lose some of their best assets when well-trained employees choose to leave the organisation as there is a possibility of knowledge transferability to competitors (Carmeli & Weisberg, 2006).

There are various costs associated with the voluntary turnover of employees, which include the organisation losing human capital in addition to the knowledge, and competencies possessed by the employee (Saeed *et al*., 2014; Shaw *et al*., 1998; Yang, Wan & Fu, 2012). Furthermore, there are heavy costs that can be associated with the administrative responsibilities associated with recruitment and selection of new employees for replacement and having to train an employee (Harris, Harris & Harvey, 2008; Khan & Du, 2014; Khawaldeh, Al Muala & Al Ziadat, 2014; Óskarsdóttir, 2015; Saeed *et al*., 2014; Yang, Wan & Fu, 2012; Winterton, 2004; Narayanan, 2016).

It is notable that the turnover of employees can be costly to organisations. According to Hayes (2015), losing human capital has critical implications for the performance and profitability of the organisation. Therefore, Hayes recommends that practitioners enact policies and practices contributory in the reduction of the loss of human capital.

Turnover antecedents were categorised into three main groups: demographic factors; professional considerations which include job satisfaction; and lastly conditions within the organisations which include justice within the organisation (Mor Barak, Nissly, & Levin, 2001). The authors suggested that attention needs to be provided to the influence that both personal and contextual factors have on an employee's turnover intentions when studied inclusively.

Consequently, is imperative for organisations to take an interest in how policies designed for the future integrate with the needs employees have and position them with the organisation's expectations (Batt & Valcour, 2001). For this, there needs to be an understanding of the various aspects of employee turnover, which include the causes, impacts of turnover, and strategies that can be facilitated to reduce the rate of turnover (Iqbal, 2010).

2.2   TURNOVER INTENTIONS

Employee turnover intentions were subject to several efforts in research over the past years concerning the globe (Amah, 2009; Carmeli & Weisberg, 2006; Kalemci Tuzun & Arzu

Kalemci, 2012; Martin Jr, 1979; Shaw, 2011). Employee turnover proceeds from an employee's intention to resign (Dhanpat, Modau, Lugisani, Mabojane & Phiri, 2018).

Tnay, Othman, Siong and Lim (2013) revealed that there is a continuous increase in turnover concerns in organisations which suggested that turnover remains an aspect which requires investigation and consideration within organisations. In literature, there are various definitions of turnover intentions. Kaur and Pankaj (2013) define turnover intention as the likelihood that an employee will change their job within a certain timeframe, which often leads to actual turnover. According to the authors, as turnover intention increases there is an expectation that actual turnover increases as well. Also, turnover intentions are referred to as when an individual intends to leave the organisation they are in (Bouckenooghe, Raja & Butt, 2013, Faloye, 2014). Tett and Meyer (1993) defined turnover intention as the mindful and intentional will for an individual to leave their employer. Also, McInerney, Ganotice Jr, King, Marsh and Morin (2015), define turnover intention as an employee's wish or effort to leave an organisation.

Islam and Alam (2015) stated that special emphasis was being placed on turnover intentions of employees as it is regarded to be a much more critical issue compared to actual employee turnover. Turnover intention is considered to be the most suitable predictor of turnover by various authors as it is perceived to be a predictor of definite quitting and is the reason this study will use turnover intention as the outcome variable instead of actual turnover (Cho & Lewis; 2012; Firth, Mellor, Moore & Loquet, 2004; Griffeth, Hom & Gaertner, 2000; Sutherland & Jordaan, 2004; Tett & Meyer, 1993; Tuzun & Kalemci, 2012; Van Breukelen, Van der Vlist & Steensma, 2004).The mentioned studies have established the measurement of turnover intentions to be the most common method to assess the risk of turnover amongst employees. It is imperative for organisations to examine and grasp the reasoning behind turnover intention and how it can be controlled or reduced.

As emphasised, there are various costs that were associated with turnover intention such as costs concerning the need for training and recruitment, which can be regarded as visible costs to an organisation (Arshad & Puteh, 2015). Also, there are hidden costs, which are the loss of knowledge and employee morale because of remaining employees being overworked after the loss of a colleague and is a weakness that organisations should strive to eradicate (Ammar& Abu-Jarad, 2013; Atef, Leithy & Al-Kalyoubi, 2017; Saeed, Waseem, Sikander, & Rizwan, 2014).

Employees of any organisation are crucial in ensuring the survival of organisations and the loss of good employees within the organisation has a negative impact on the competitive advantage possessed by an organisation attributable to the decrease in productivity (Arshad & Puteh, 2015; Juhdi, Pa'wan & Hansaram, 2013). Despite this, there is little knowledge of these relationships in the context of learners in South Africa currently. Wong and Wong (2017), posit that for findings on turnover intentions that were conducted in Western settings to be generalisable, they must be investigated in various contexts.

Ramadhani (2014) recognised that several of the studies that were conducted concerning turnover intentions have not been examined in an African context, as most studies were conducted in other countries. There are gaps concerning the geographical and methodological contexts in the studies. It is important to increase knowledge about learners as they have strong potential for an organisation's future (Sharp, Hides, Bamber & Castka, 2000).

Turnover intention is a variable that requires further investigation to gain broadened knowledge on the subject to in turn assist organisations in effectively managing turnover rates through strategies concerning turnover intention. Furthermore, Arshad and Puteh (2015) suggest that future research needs to study other variables that could be possible predictors of turnover intentions which this study intends to do with the investigation of innovative work behaviour as a predictor of turnover intentions. The review will now outline the literature relating to turnover behaviour.

2.2.1 TURNOVER INTENTION BEHAVIOUR THEORIES

According to Rahman and Nas (2013) when it comes to turnover intentions, the human capital theory and the social exchange theory are the most acknowledged perspectives. Therefore, the discussion on the theories related to turnover intentions will begin with a summary of the two and proceed to outlining the rest of the theories.

Social Exchange Theory

Social exchange theory is based on value derived from exchanges within the employee and employer relationship. This theory holds that how an employee evaluates the quality of the exchange relationship with their employer has a fundamental effect on their well-being and motivation. Reciprocity is imperative in how the relationship is built (Avanzi, Fraccaroli, Sarchielli, Ullrich & van Dick, 2014).

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An employee has a greater probability of reacting negatively when there is failure from either party in the interchange of relations. As a result, there will be a sense of imbalance between the parties (Umar & Ringim, 2015). Thus, turnover intentions can be reduced if parties meet the expectations employees have regarding the reciprocation of the efforts they contribute to the organisation. Turnover intentions may increase in the event that employees' expectations are not met and there is a perception that their contribution to the organisation is not valued, which result in less effort made by employees (Rhoades & Eisenberger, 2002).

Human Capital Theory

This theory proposes that employees are less likely to desire to leave their job when an organisation invests in human capital through the training and education of employees. As a result, an inverse relationship is created between the training of employees and their intent to leave the organisation, with employees rarely attempting to find job alternatives that may meet their expectations (Perez, 2008). The investment of human capital through education and training may influence turnover intentions of employees (Hayes, 2015).

The relevance of the human capital theory in thus study derives from human capital resources being critical factors in an employee's decision to resign from an organisation (Hayes, 2015). This theory posits that employees' knowledge and skills can generate income for employers through the degree of knowledge they possess (Ng & Feldman, 2010).

The Unfolding Model of Voluntary Turnover

The Unfolding model, which is regarded as a new theory has challenged paradigms that have previously prevailed (Hom, Lee, Shaw & Hausknecht, 2017). According to Mxenge, Dywili and Bazana (2014), the Unfolding Model of Voluntary Turnover is one of the models that explain the nature of turnover and possible motives that lead to turnover intention. The model explains the cognitive processes through which employees decide to either leave or stay with their employer. This model is considered groundbreaking in the field of turnover research due to the identified constructs and processes that expand insight on the motives that lead employees to leave their organisations (Hom et al., 2017).

2.3 INNOVATIVE WORK BEHAVIOUR

Innovation has often been studied as a dependent variable and minimal studies have researched individual's levels of innovativeness as an independent variable. Anderson, De Dreu and Nijstad (2004) have suggested that future research on innovation should look at innovation as an independent variable and to examine the impact it may have on various outcomes. As a result, this study aims to fill in the gap that exists in current literature researching innovative work behaviour as an independent variable. In addition, in a contemporary South African context knowledge concerning innovative work behaviour is necessary. Innovative behaviour from employees is imperative for organisations to survive and the creation of a positive atmosphere can aid organisations in reducing turnover (Agarwal, 2014; Kesen, 2016).

Anderson, De Dreu and Nijstad (2004), emphasised a gap in innovation research which is the investigation of innovativeness of an individual as an independent variable. This study contributes in the filling the gap by studying innovativeness and examining it as an independent variable emphasised to be lacking in current literature. According to Shalley (2000), inadequate studies investigated a link between participation in creative activities and turnover intentions of an employee.

In recent years, creativity and innovation were used interchangeably (Stradinger, 2016). There is a consensus that creativity is merely a facet of innovative work behaviour which involves facilitating ideas and not solely the generation of ideas (Amabile, 1988; Atta-Owusu, 2016; King & Anderson, 2002; Pukienė, 2016; West & Farr, 1990). As a result, numerous studies focussed on creativity and its effect on employee turnover intentions and have not considered other necessary parts of innovative work behaviour. It is imperative to investigate innovative behaviour as it goes beyond the generation of ideas and includes the behaviours required to execute plans and reach improvements that will improve the performance of the organisation (King & Anderson, 2002).

Innovation and creativity are regarded as two parts of the process improvement which include generating and implementing ideas and have collective effects (Anderson, Potočnik & Zhou, 2014; Barrère, 2013).

According to the social exchange theory, the levels of innovative work behaviour are dependent on the levels of rewards that employees receive (Janssen, 2000). When employees experience greater levels of rewards, they tend to demonstrate higher levels of innovative work behaviour.

When employees experience low levels of rewards from their employers, they are more likely to limit their innovative work behaviour levels.

There was a shift in what drives economic system from being dependent on land capital now depends on innovation and knowledge (Chatchawan, Trichandhara & Rinthaisong, 2017). Organisations have increasingly become dependent on their employees' ability to innovate, as crucial in the success of various organisations (Patterson, Kerrin, Gatto-Roissard & Coan, 2009). Innovation serves as a differentiation device amongst organisations and became a source of competitive advantage and survival of any organisation in today's competitive environment, placing innovation amongst the most essential aspects organisations encounter today and can be regarded as crucial to organisations' success (Abid, Zahra & Ahmed, 2015; Alsughayir, 2017; Lyon & Ferrier, 2002; Patterson, Kerrin, & Gatto-Roissard, 2009; Popa, Preda & Boldea, 2010; Tohidi & Jabbari, 2012; Salaman, & Storey, 2002; Shih & Susanto, 2011; Yuan & Woodman, 2010).

Innovation is regarded as one of the approaches that can increase employee performance (Janssen, 2004; Osman, Shariff & Lajin, 2016; Sadikoglu & Zehir, 2010). Furthermore, Imran, Fatima, Zaheer, Yousaf and Batool (2012) suggest that employee performance is an issue that requires prioritisation if organisations wish to succeed in a competitive environment emphasising the importance of innovation in ensuring organisations survive across industries. It is recognised that the innovative potential of any organisation resides in the knowledge, abilities and expertise of its employees. As a result, it is to the benefit of the organisation when employees can adequately be retained with minimal turnover. (Patterson, Kerrin & Gatto-Roissard, 2009).

It is imperative to understand the definition of innovation to pursue an investigation. Simmonds (1986) define innovation as a basic creative process and new ideas comprising various products and services, fresh new ways of using the existing products in organisations and discovering new markets that can consume existing products. Greenhalgh and Rogers (2010) define innovation as the employment of new ideas to either the products or other activities of an organisation that result in increased value. This definition is supported by Knox (2002) who defines innovation as a process that offers added value and a level of freshness to the organisation.

There are three phases concerning innovative work behaviour: the generation, promotion and execution of ideas (Scott & Bruce, 1994). Scott and Bruce explain that individual innovation commences in the recognition of an issue and creating appropriate solutions. Furthermore, the individual progresses to search for support for the idea followed by facilitating the idea. For the purpose of this study, this definition seems to be the most relevant as innovative work behaviour moves away from solely idea generation to also having the necessary behaviours required for facilitating the ideas (De Jong & Den Hartog, 2008; Scott & Bruce, 1994).

Innovative work behaviour is regarded as a vital factor in managing the changes occurring in the economy and increase in competitive advantage and survival of organisations (Niesen, Van Hootegem, Vander Elst, Battistelli & De Witte, 2018; Pukienė, 2016). Also, employees as a function are vital in the process.

Conflicting outcomes were reported concerning innovation in the workplace. Job satisfaction and improved job security were outcomes argued in one spectrum; others argued that innovation in the workplace can result in job intensification, straining employees mentally (Kalmi & Kauhanen, 2009). Inconsistencies in arguments relating to innovation and whether it has a positive or negative effect on the outcomes at work were established.

The association between innovation and turnover intentions were studied in a limited way in literature (Kesen, 2016). According to the Kesen, there needs to be an understanding as to whether innovation within the organisation may influence an employee's decision to leave the organisation. Studies need to be conducted across various contexts as the adaptability to innovation can vary with various employees.

Also, there is a growing agreement that innovation within organisations only happens attributable to the work and behaviours of employees (Atta-Owusu, 2016). Organisations that support creativity are more likely to have more satisfied employees who indicate lower intentions to leave the organisation (Mayfield & Mayfield, 2007; Shalley, Gilson & Blum, 2000).

Also, creativity was established to influence the retention rates within organisations (Shalley, 2000). A strong relationship was established between participation in creative activities and turnover intentions of employees (Shalley, 2000). Similarly, Baer (2012) established that a strong connection is formed between the employee and employer from the longing of

employees to improve the work environment through facilitating ideas, which results in improved retention of employees and commitment to the organisation (Baer, 2012).

Findings by Shih & Susanto (2011), concur with findings outlined as a positive relation was established between innovative work behaviour and turnover intentions. Creative employees tend to resign from their organisation in search for more desirable work opportunities. These findings are supported by authors who established a positive effect of employee creativity on pre-quitting behaviour as higher levels of creativity were associated with an increase in pre-quitting behaviours (Li, Duverger & Yu, 2018).

Innovative employees were established to have a stronger tendency to have turnover intentions in future attributable to having better performance and in exchange receive favourable assessments that boost their self-confidence and encourages the pursuit of better employment opportunities (Lance, 1988; Shih & Susanto, 2011). Further studies concerning employee retention established numerous facilitated ideas and concerns resolved by an employee, impacting on their likeliness to disable participation in innovative initiatives within the organisation, lowering the probability of intending to quit (Shalley, Zhou & Oldham, 2004; Stradinger, 2016). A recent study has established no significant effect of innovative work behaviour on turnover intentions of employees (Eroğlu, Topçu, & Basım, 2018). Ebrahim (2014) established that organisations with innovative cultures were associated with the satisfaction and retention of employees.

Kesen (2016) established that a rise in innovation assisted in the reduction in turnover as innovation may serve as a way to keep employees away from monotony as innovation offers the opportunity for employees to reset their perceptions and come up with fresh ideas. The authors also emphasise that innovation can also have a negative effect on employees' turnover if the culture within the organisation does not allow for innovative activities (Eroğlu, Topçu, & Basım, 2018). There is literature concerning both sides of the issue and there is no clarity concerning what the situation may be in the South African context of learners and how it may change over time after the completion of their studies. The following hypothesis is suggested based on the discussed literature:

H1: There is a significant association between innovativeness and turnover intentions among continuous learners.

In a study conducted in Korea by Joo, Hahn and Peterson (2015), it was established that employees intended to stay longer in an organisation that encouraged creativity and innovation and had complex jobs. Demircioglu (2017) established that innovation can reduce turnover intentions and increase the satisfaction and commitment levels of employees. According to the author, another area that remains unexplored is the relationship between the climate for innovation and employee turnover.

In a study conducted in the hospitality industry, the more creative chefs had a stronger intent to resign from their organisation (Robinson & Beesley, 2010). No significant relationship was established between creativity and turnover intentions in a study conducted in Bangkok (Tongchaiprasit & Ariyabuddhiphongs, 2016).

Lin (2016) proposed that organisations promoting an innovative atmosphere can contribute positively to their employee's intention to remain within the organisation, as a negative correlation was established between innovative atmosphere and intention to leave an organisation. Also, climates for innovation and relationship with supervisors were established to influence turnover intentions of employees (Mizrahi, 2018; Wang & Ma, 2013).

There are limited findings concerning whether turnover intentions and innovation have a positive or negative association (Eriksson, Qin & Wang, 2014). A curvilinear relationship was also established between innovation and the turnover of employees (Eriksson, Qin & Wang, 2014; Müller & Peters, 2010)

There are inconsistent findings regarding the relationship between innovation and work-life balance as studies have established a direct and negative association between turnover and innovation (Ettlie, 1985; Price, 1977). No association was established between innovation power and turnover (Elmacı & Yalçın, 2012).

Stradinger (2016) point out that current literature has not yet proven the link between innovation in the workplace and retaining of employees within the organisation. It was established that employees in organisations with an innovation-oriented culture tend to demonstrate higher levels of satisfaction and need to remain in an organisation (Odom, Boxx & Dunn, 1990).

Inconsistencies are established in current literature as there are contradictory findings concerning the effect that innovative behaviour has on an employee's turnover intentions.

Certain authors have established that there is no significant effect of innovative work behaviours on employee's turnover intentions whilst others have established that innovative work behaviour resulted in lower turnover rates or that innovative employees have a stronger tendency to resign from their organisation in future. There is no clarity in literature regarding the effect that innovative work behaviour has on an employee's turnover intentions and this study intends to establish the extent to which innovative work behaviour influences an individual's turnover intentions.

In addition, this study will investigate other variables specifically job satisfaction and perceived supervisor support as mediators in the proposed relationship. In current literature, it is unclear on whether the variables mediate the relationship as certain studies have established full mediation, partial mediation or no mediation at all for both perceived supervisor support and job satisfaction. (Ibrahim, 2013; Lekhuleng, 2016; Noor, 2011; Özbağ & Ceyhun, 2014; Shahpouri, Namdari & Abedi, 2016). Findings of this study may differ for learners as they can be grouped in a different cohort and wish to advance their careers and the proposed channels might differ for learners as they may hold other factors as channels.

Since there are inconsistencies concerning the function of innovative work behaviour on turnover intentions of employees, this study will examine whether innovative work behaviour may aid the reduction of turnover within organisations or if it aids turnover intentions amongst employees. Furthermore, there is a limitation of studies that investigated the relationship between innovative culture and retaining employees within the South African context (Ebrahim, 2014). As a result, this study responds to recommendations made by Robinson and Beesley (2010) for further studies to be conducted concerning creativity and turnover intention of employees as there is no clarity concerning the reason behind the variation of the relationship according to gender, which demands further investigation.

According to Mayfield and Mayfield (2007), the relationship between the perceptions of the creative setting and turnover remained unexplored in literature. Further investigation on the suggested relationship between how the employee perceives the creative setting and turnover intentions is warranted. This study responds to previously suggested areas for future research in attempts to gain a better grasp of the association that exists between employee innovation as a predictor in organisational outcomes such as employee turnover.

2.4   PERCEIVED SUPERVISOR SUPPORT

In today's unpredictable and competitive environment, there is an increase in the importance of the supervisor's function. According to Rathi and Lee (2017), supervisors have a vital function in the success of companies through their abilities to engage, motivate and retain employees within an organisation.

Kim, Lee and Lee (2013) suggested that little attention was provided to the relationship between supervisor and employee relationships in the existing literature concerning the turnover of employees (Kim, Lee & Lee, 2013). Subordinates are dependent on supervisors' various aspects such as knowledge, resources in the form of supplies and support in the form of backing in the development and realisation of ideas employees generate (Kanter, 1988). It was suggested that supervisors are required to nurture, encourage and support creativity in order for employees to participate in innovative behaviour (Shalley and Gilson, 2004). Rathi and Lee (2017) established shortcomings concerning linking supervisor support to various work attitudes.

Shalley, Gilson and Blum (2009) stress the necessity to have supervisors who are supportive in a work environment. Employees assess the support anticipated from their supervisors before engaging in innovative behaviour. When lack of support is perceived, employees' effort to gain the support from supervisors might be meaningless (Janssen, 2005; Kamalanabhan, 2013). This perception is attributable to the fear of not obtaining the required level of support to ensure an innovative idea is facilitated. As a result, the perceptions of supervisor support can either boost confidence or discourage employees from being innovative. Employees engage in innovative behaviour when they have the confidence that they will obtain the necessary support. Stradinger (2016) did not find any relationship between employees engaging in innovative behaviour and their relationship with supervisors.

According to Firth, Mellor, Moore and Loquet (2004) the support from supervisors can serve as a mediator when it comes reducing the effect that stressors have on an employee's turnover intentions. Furthermore, Nijenhuis (2015) established that employees that demonstrate quality relationships with their supervisors have a greater tendency to show innovative work behaviour in an organisation and boost their confidence on the outcomes that being innovative may provide.

Supervisors with people-oriented leadership were indicated to influence how employees were satisfied, committed to the organisation and essentially their decisions to either remain with their employer or leave (Mathieu, Fabi, Lacoursière & Raymond, 2016).

Based on this literature, the following hypothesis is derived:

H2: Perceived Supervisor Support mediates the relationship between innovativeness of an individual and turnover intentions among continuous learners.

Facilitating ideas often requires effort and motivation which involves establishing relationships or strong bonds (Baer, 2012). Also, supervisory support was established as critical in determining the levels of job satisfaction and turnover intentions of employees (Yanchus, Periard & Osatuke, 2017). Furthermore, when a supportive environment is supplied by supervisors through fairness and feedback with employees, there is an occurrence of more creativity within work environments (George & Zhou, Stradinger, 2016; 2007; Zhou, 2003). The mood of the supervisor positively influences creativity regardless of whether it is positive or negative (Stradinger, 2016).

Graen and Uhl-Bien (1995) emphasise a principal assumption of the leader-member exchange theory which states that the behaviour of employees in a work context is dependent on how supervisors treat employees and the type of relationship they have with employees. According to Dhanpat, Modau, Lugisani, Mabojane and Phiri (2018) the support provided to employees by their supervisors decreases the stress encountered on the job and could produce a sense of belonging which could supply individuals with adequate reasons to remain with their employer.

According to Kalemci Tuzun and Arzu Kalemci (2012), since supervisors' function as a representative of the organisation in the direction and evaluation of employees, subordinates tend to attribute treatment partially to the organisation and not exclusively to the supervisor. Employees are more likely to be committed to the organisation if they are loyal to their supervisor as supervisors are perceived as representatives of the organisation (Chen, Tsui & Farh, 2002). Employees that exhibit loyalty towards their supervisors are more likely to remain with their organisation.

Authors have established that an employee's relationship with supervisors is an important predictor of the turnover of employees. It was noted that findings on the relationship vary according to context which posits that the relationship may vary in the context of South Africa

(Kim, Lee, & Lee, 2013). Perceived Support has also been regarded as backbone in certain industries in efforts to reduce turnover intentions amongst their staff and was established to have a negative relationship with turnover intentions (Kalidass & Bahron, 2015; Newman, Thanacoody & Hui, 2011). Various inconsistencies are reported concerning the strength of the relationship which still requires investigation (Alshutwi, 2017). Perceived supervisor support is essential for learners as individuals often juggles various responsibilities; it is a factor that could influence the reciprocation a learner provides to the organisation.

2.5 JOB SATISFACTION

Atef, Leithy and Al-Kalyoubi (2017) suggest that job satisfaction is one of the most widely studied constructs and its impact on the employees' turnover intentions is a point of interest for several researchers. There are several definitions of job satisfaction as a concept attributable to its complexity and it being an extensively researched area. It is imperative to understand the various definitions of job satisfaction.

According to Oosthuizen, Coetzee and Munro (2016) job satisfaction can be defined as a general affectional inclination of individuals towards work functions that they currently occupy. Munir and Khatoon (2015) define job satisfaction as the degree to which there is fulfilment in the needs that an employee has on the job which they hold important such as security and affiliation. For the purpose of this study, job satisfaction will follow the definition of Weiss *et al*. (1967) where job satisfaction is the degree to which employees accomplish and sustain interaction with the environment, fulfilling both their extrinsic and intrinsic desires.

Mendis and Weerakkody (2017), define job satisfaction as the degree to which an employee is pleased with his or her work. There is an indication of job satisfaction when an individual has optimistic and favourable attitudes about their jobs. Similarly, job dissatisfaction is when an individual has pessimistic and unfavourable attitudes about their jobs.

Job satisfaction was established to be the most significant and important predictor of turnover (Cavanagh & Coffin, 1992; Karlsson, 2008; Martin, 2008). High job satisfaction was associated with a lower turnover intention. Positive attitudes towards work is often associated with high levels of job satisfaction and dissatisfied employees often have negative attitudes towards their work (Han & Jekel, 2011; Mbah & Ikemefuna, 2012). If individuals reflect and believe they have the resources to leave their current employer and find no conflict between

their intent to leave behaviours with the perception of social punishment by their close circle they will cultivate turnover intentions that will eventually result in actual turnover.

Dockel, Basson, Coetzee (2006) emphasise that the levels of satisfaction are vital in retaining employees, especially knowledge workers. Similar results were established in Shields and Ward's study (2001) that lower job satisfaction increases the employees' intention to quit. Özbağ and Ceyhun (2014) established that higher levels of job satisfaction were associated with lower levels of turnover intention which contradicts other studies who established no significant relationship. Furthermore, job satisfaction was established to directly impact turnover intentions negatively, employees who are not satisfied are more likely to intend to quit their work (Khawaldeh, Al Muala & Al Ziadat, 2014; Saeed, 2014; Yin-Fah, Foon, Chee-Leong & Osman, 2010). Furthermore, Martin (2008) reveals that employees have a stronger tendency to leave their jobs when they are less satisfied.

Mosadeghrad, Ferlie and Rosenberg (2008) established job satisfaction to significantly predict an employee's intention to leave. According to Martin and Roodt (2008), the greater satisfaction employees experience the less likely employees would be to think about leaving the organisation attributable to the stronger organisational commitment. On the other hand, they also established that individuals with low satisfaction levels are more likely to pursue other employment ventures. A negative relationship was established between job satisfaction and employees' intention to quit in a study conducted amongst nurses (Jacobs & Roodt, 2008).

Dissatisfied employees were established to show higher turnover intentions than employees who were satisfied and because have a greater chance of seeking new employment opportunities because dissatisfaction results in thoughts of quitting (Foster, Lonial & Shastri, 2011; Hellman, 1997; Hom, Roberson & Ellis, 2008). This supports findings by Bysted (2013) who established that employees who are satisfied have a greater intention to remain in their organisations. There is evidence on both sides of the issue which requires further investigation as there is no clarity on the relationship from current literature. Based on the literature, the following hypothesis is proposed:

H3: Job Satisfaction mediates the relationship between innovativeness of an individual' and turnover intentions among continuous learners

Job satisfaction was established to significantly mediate the relationship between work stress and turnover intentions (Kuo, Lin, & Li, 2014). An employee requires a certain degree of

internal force that will serve as a driver for them when encountered with challenges in creative work (Shalley & Gilson, 2004). Job satisfaction was established to be associated with innovative behaviour and was established as a significant predictor in various studies as satisfied employees were established to demonstrate positive behaviour such as being innovative (Verdiesen, 2015).

Although research has shown that job satisfaction has an influence on innovative work behaviour, a study conducted by Verdiesen (2015) established no significant effect of job satisfaction on innovative work behaviour. This contradicts findings that have established job satisfaction to lead to employees' reciprocation through endorsing innovation in the workplace (Attiq, Wahid, Javaid, Kanwal & Shah, 2017; Raiser, 2016). Furthermore, the mediating effects of job satisfaction were established in studies concerning innovative work behaviour and social network services (Chung & Kim, 2017). Learners may be different as they may have various intrinsic and extrinsic desires and what could make them satisfied in an organisation when compared to other employees in an organisation.

2.6   DISTRIBUTIVE JUSTICE

Distributive justice refers to the notion that employees are concerned with the just distribution of resources within the organisation such as bonuses (Pan, Chen, Hao & Bi, 2018; Wojtczuk-Turek & Turek, 2013; Young, 2012). Organisational justice was regarded as an important cause of various factors that impacts attitudes of employees such as their satisfaction with the job, turnover intentions and innovative work behaviour (Pan, Chen, Hao & Bi, 2018). Distributive justice is particularly important in the South African context as studies concerning distributive justice remain poorly developed (Seekings, 2002).

Social exchange theory posits that employees intend to stay with their employer and perform better when they have a positive perception of justice and rewards in association with their efforts (Avanzi, Fraccaroli, Sarchielli, Ullrich & van Dick, 2014). The consequences of low distributive justice include an employee's decision to resign as distributive justice impacts turnover intentions negatively (Hetidrix, Robbins, Miller & Summers, 1999; Hom, Griffeth & Sellaro, 1984; Wong & Wong, 2017).

A positive relation was established between organisational justice and innovative behaviours (Kim & Lee, 2013; Suliman, 2013; Wojtczuk-Turek & Turek, 2013). Anderson, De Dreu and Nijstad (2004) established that employees who experience distributive unfairness are reluctant

to engage in innovative behaviour. Distributive justice was established to have great effects on their intention to stay and job satisfaction levels amongst Hong Kong employees (Fields, Pang & Chiu, 2000). This is supported by various authors who established that distributive justice will increase job satisfaction and the innovativeness of employees (Akram, Haider & Feng, 2016; Gozukara & Yildirim; 2016; Momeni, Ebrahimpour & Ajirloo, 2014; Shih & Susanto; 2011).

This contradicts findings established in a study conducted by Almansour and Minai (2012) who established no relationship between innovative work behaviour and distributive jusitce in a Jordan society, which is not in alignment with current literature regarding the relationship between distributive justice and innovative work behaviour. These findings demonstrate the possibility that a change in context may derive various findings from the established findings in Western countries. South Africa is country known to be socially diverse concerning racial and ethnic divisions and various official languages (Francis & Hemson, 2010).

In a study conducted by Shih and Susanto (2011) distributive justice was established as a negative moderator between innovative work behaviour and turnover intentions which could serve as a mitigating variable within the stated relationship. They also established that the higher the perceived distributive justice amongst innovative employees the less they consider leaving their organisation. Perceived distributive justice is a variable that was established as a moderator in various studies on the relationship between innovative work behaviour with flexibility I-deals and on the relationship between turnover intention and job autonomy (Ferris & Treadway, 2012; Haar & Spell, 2009; Kimwolo & Kimosop, 2017). The following hypothesis is derived based on the literature:

H5: Perceived distributive justice moderates the relationship between innovativeness of an individual and turnover intentions among continuous learners.

Distributive justice was established to mitigate the desire of creative employees to resign from their organisation (Birecikli, Alpkan, Ertürk & Aksoy, 2016; Shih & Susanto, 2011). The authors concluded that high perceptions of justice within an organisation can moderate the increases in turnover intentions. A negative relationship between distributive justice and turnover intentions was established as turnover intentions tended to decrease when distributive justice was high within an organisation (Nadiri & Tanova, 2010).

Distributive justice was established to have a negative relationship with turnover intentions along with the other dimensions of organisational justice (Cohen-Charash & Spector, 2001). These findings are supported by Brashear, Manolis & Brooks (2005), who established a negative association between distributive justice and turnover intentions. According to Holston-Okae (2017), when individuals perceive they are treated without bias, there is an increase in their self-worth and identity which in return results in a lower propensity to leave their employers.

Also, Cropanzano and Greenberg (1997) stress that unfair processes within an organisation produce negative consequences such as turnover and low levels of satisfaction and commitment. In addition, Aghaei, Moshiri and Shahrbanian (2012) established a significant negative relationship between distributive justice and turnover intention. Furthermore, the perception that employees have concerning distributive justice was established to have a serious effect on retaining employees (Elçi, Şener, & Alpkan, 2011; Fields, Pang & Chiu, 2000; Hayes, 2015; Khan, Abbas, Gul & Raja, 2015; Loi, Hang-Yue & Foley, 2006).

Li and Cropanzano (2009) established the perceptions of distributive justice had significant relations with the commitment, turnover intentions and job satisfaction of employees in the context of East Asia.

Also, employees want their efforts to be fairly rewarded which will in return result in greater commitment to their employer and reduce their desire to seek opportunities elsewhere as they will be satisfied and reciprocate with involvement in their jobs (Birecikli, Alpkan, Ertürk & Aksoy, 2016; Khan, Abbas, Gul, & Raja, 2015). If there is a perception that the rewards are not distributed fairly, employees will have no desire to stay within the organisation. Perceptions of justice within the organisation provide employees a more positive outlook concerning their job (Birecikli, Alpkan, Ertürk & Aksoy, 2016; Shubaka, 2014).

Abu Elanain (2010), established that employees who report positive emotions regarding distributive justice were established to have greater levels of satisfaction with their job and have less propensity to resign attributable to an increase in commitment. The present study has addressed the issue with the examination of the potential moderating effects that distributive justice may have on turnover intentions of employees. Abu Elanain (2010), emphasised that inadequate studies in a non-Western setting have addressed the possible association between perceptions of justice amongst employees and the effect it may have on turnover. Furthermore,

the area of distributive justice and turnover intentions in general remains limitedly investigated and has provided inconsistent findings (Loi, Hang-Yue & Foley, 2006).

Literature distributing justice encouraging employees to be more innovative is scant. According to Young (2012), future research should incorporate consequences of innovative behaviour and find proper moderators of the relationship amongst the variables. This study will fill the current gap that exists in literature concerning the proposed research. There are inconsistencies in findings regarding whether a stronger prediction occurs when perceived distributive justice is low or at an elevated level. This study intends to investigate the current contradictions that exist in literature. The diverse South African context of learners is important as they form part of employees that were previously disadvantaged and are pursuing a means to advance their careers. Insight into learners and tracking changes in these relationships over time can provide organisations insight into how to effectively retain learners across the various phases they pass whilst completing their studies and once they finish.

2.7 CORE-SELF-EVALUATIONS

Core-self-evaluations are defined as the important assessments that individuals make about themselves, their competencies and abilities (Chang, Ferris, Johnson & Tan, 2012). The relation of core-self-evaluation with various outcomes such as job satisfaction and perceptions in the work setting were supported by meta-analytic results which have also identified core-self-evaluation to be negatively concerning turnover intention (Chang *et al.*, 2012).

Individuals with high core-self-evaluations are expected to display greater confidence in how intensely they react to stressors within their organisations when compared to individuals with low core-self-evaluations (Haynie, Harris & Flynn, 2016). According to the authors, individuals with high core-self-evaluations tend to have a positive perception of their work which translates into greater satisfaction with their jobs in comparison to those with low core-self-evaluations. Individuals' perceptions and behaviour are influenced by a joint self-appraisal of their evaluations concerning self-esteem, neuroticism, self-efficacy and locus of control (Judge, 1997)

Turnover intentions were established to be negatively impacted by core-self-evaluations (Dasgupta, 2015). Individuals with known higher levels of core-self-evaluations were reported to thrive in environments favourable as the core-self-evaluation operates as a shield from the potential impact of adverse circumstances (Cadiz, 2010). Joo, Hahn and Peterson (2015)

established that Korean knowledge workers in a corporation had lower levels of turnover intention when they had high core-self-evaluations and had intentions to stay longer in their place of employment. The authors concluded that employees would intend to remain in an organisation provided that there is support and encouragement for innovation and jobs complex in nature.

Greaves, Parker, Zacher and Jimmieson (2015) established no inverse relationship between core-self-evaluations and turnover intentions. This emphasises inconsistencies that currently exist in literature concerning the variables and the need to further investigate the relationship to understand the dynamics of the relationship and how they may differ under changed contexts.

High core-self-evaluations were concerning low turnover intentions as individuals will think less of leaving their employer when encountered with changes and challenges within the organisation when compared to individuals that have low core-self-evaluations who will tend to resign from their organisation when encountered with similar challenges (Haynie, Harris & Flynn, 2016). As a result, core-self-evaluations established an internal resource for individuals managing various changes that may occur within an organisation.

According to Javed *et al*. (2014), studies lack, focussing on core-self-evaluations and the impact they have on an employee's turnover intentions. Thus, there is a lack of knowledge relating to the relationship and the impact it may have on an individual's decision to leave and the implications it may have for leaners as their evaluations of themselves may limit their career progression. This study considers the current gap that exists in literature concerning the direct relation that exists between core-self-evaluations and turnover intentions. On the basis of this literature, the following hypothesis is derived.

Based on this literature, the following hypothesis is suggested:

H4: There is a significant association between core self-evaluations and turnover intentions among continuous learners.

According to Chang *et al*. (2012), core-self-evaluation may serve as a moderator between the relationship of variables as how an individual perceives their worth influences their reaction to events. The moderating effects of core-self-evaluations on turnover intentions were established in a research accomplished in Pakistan (Javed *et al*., 2014). They established that employees

that have high core-self-evaluations tend to have a positive approach concerning all scenarios and because it does not affect their turnover intentions.

A negative relationship was established between core-self-evaluations and turnover intentions (Albrecht, Paulus, Dilchert, Deller & Ones, 2013). This finding is supported by various studies which have also established a negative relationship between core-self-evaluations and turnover intentions amongst employees (Joo, Hahn & Peterson, 2015; Rode, Judge, & Sun, 2012; Vîrga, De Witte & Cifre, 2017). Individuals with lower core-self-evaluations have a stronger tendency to resign from their organisations.

These findings are supported by Dörner (2012) who established that employees with high self-efficacy have greater confidence when it comes to innovative activities and are more likely to participate in innovative behaviour. The opposite applies to employees with low self-efficacy who believe innovative work behaviour surpasses their coping skills and because employees avoid participating in innovative work behaviour. Furthermore, individuals with high self-efficacy tend to raise their efforts to meet the difficulties they encounter while individuals with low self-efficacy view the challenges they encounter as negative and abandon any efforts at innovative work behaviour. Based on the literature, the following hypothesis is proposed:

H6: Core self-evaluations moderate the relationship between innovativeness of an individual and turnover intentions among continuous learners.

Employees with high core-self-evaluations were established to demonstrate more innovativeness at work (Attiq, Wahid, Javaid, Kanwal & Shah, 2017; Judge & Kammeyer-Mueller, 2011). Furthermore, employees intended to stay in an organisation longer when demonstrated high levels of core-self-evaluations (Joo, Hahn & Peterson, 2015).

Core-self-evaluation was established to act as a mitigator in the impact that social stressors may have on the satisfaction and turnover intention of employees. Core-self-evaluations are relevant to this study attributable to the ability of acting as a coping resource (Haynie, Harris & Flynn, 2016; Harris, Harvey & Kacmar, 2009).

Individuals with known higher levels of core-self-evaluations were reported to thrive in environments favourable as the core-self-evaluation operates as a shield from the potential impact of adverse circumstances (Cadiz, 2010). Joo, Hahn and Peterson (2015) established that

Korean knowledge workers in a corporation had lower levels of turnover intentions when they had high core-self-evaluations and had intentions to stay longer in their place of employment.

Chang, Ferris, Johnson, Rosen and Tan (2012), established a negative relationship between core-self-evaluations and turnover intentions as there is a tendency for individuals with higher core-self-evaluations to focus on the positive parts of their settings and concentrate less on the negative parts and because indicated greater satisfaction with their conditions at work (Ferris *et al*., 2011). Joo, Han and Peterson (2015) established that employees with higher core-evaluations were more likely to remain within their organisations and show greater levels of satisfaction with their conditions at work.

The experiential variables and type of work are discussed below and current literature regarding the association with turnover intentions and innovative work behaviour are outlined.

2.8   EXPERIENTIAL VARIABLES AND TYPE OF WORK

According to Hongvichit (2015) future research in the area of employee turnover should use demographic variables as moderators to study the relationships between turnover intention and other variables under various conditions. This study tests theory concerning the variables on the proposed relationship. As a result, this study aims to investigate theoretically predicted moderating effects that various experiential variables and the type of work have between innovative work behaviour and turnover intentions of employees. Furthermore, Haider and Akbar (2017) recommend that future studies should include demographic variables. In addition, there is limited literature that has investigated the moderating effects of experiential variables and type of work in a South African context.

Russ and McNeilly (1995) posited that researchers can choose amid various individual difference variables as possible moderators when studying turnover intention. According to the Oxford Dictionary, an individual difference variable is a variable distinctive to an individual such as their age and gender.

Demographic variables were established to be strong predictors of employee turnover by Dhanpat, Modau, Lugisani, Mabojane and Phiri (2018). Significant correlations were established between demographic variables and turnover intentions by Randhawa (2007). Turnover intention is established to be greatly influenced by demographic variables of an individual with an indication that turnover intention decreases as the age and experience of an

employee increase. Demographic variables were insignificant predicators of turnover intentions in a study by Joo, Hahn and Peterson (2015). Chiu, Lin, Tsai and Hsiao (2005), report that there were inconsistent findings concerning gender and level of qualification with turnover intentions.

Education, age, tenure and gender were established to be associated with turnover intentions (Ongori, 2007). Turnover intentions were established to significantly report various scores amongst nurses on characteristics such as educational level, years of experience, age and professional titles (Liu *et al.*, 2018). Results from a study by Hayes (2015) established no statistically significant relationship between gender, tenure and education in the prediction of turnover intentions. Furthermore, according to Van Breukelen, Van der Vlist and Steensma (2004), the age and tenure of individuals has often been used as moderators and predictors in studies relating to the turnover of employees.

2.8.1 Age

Du Plooy and Roodt (2013) established age as a moderator which concurs with various authors who have established age as a moderator in the prediction of turnover intentions (Cotton & Tuttle, 1986; Emiroğlu, Akova & Tanrıverdi, 2015; Igbaria & Guimaraes, 1993; Karatepe & Aleshinloye, 2009; Karatepe, Uludag, Menevis, Hadzimehmedagic & Baddar, 2006; Krecker, 1994).According to Zaniboni, Truxillo and Fraccaroli (2013), work outcomes can have various results depending on the period of an employee's lifetime. On account of the discussions above, the following hypothesis is proposed:

H7: Age moderates the relationship between innovativeness of an individual and turnover intentions among continuous learners.

Karlsson (2008) established that older employees were less likely to intend to resign when compared to younger employees in the engineering industry. Hayes (2015), established a significant relationship between the age of employees and their intent to resign from their organisation as younger employees were established to have a stronger tendency to leave the organisation when compared to other age cohorts. According to Óskarsdóttir (2015), younger employees were established to have a stronger propensity to resign from their organisations compared to other employees.

In a study conducted by Maheshwari, Patel and Bhinder (2015) it was established that there was a significant difference in the observed levels of turnover intentions amongst the various age groups as it was established that younger employees tend to be more anxious about their careers and the chance for growth and demonstrate a higher intention to leave their current organisation. Tanova and Holtom (2008) suggest that younger employees are risk takers and are more likely to move jobs if the opportunity arises.

Older employees are less open to change and unwilling to sacrifice formed relationships within the work context. Furthermore, in a study conducted by Perez (2008), age was established to be negatively concerning turnover intention with an indication that intend to quit reduces as an employee gets older.

2.8.2 Gender

Gender was used as a moderator across various studies in various contexts. In a study conducted by Callaghan (2017a) gender was tested as a moderator on the determinants of work performance on research productivity. Concerning the focus of the study, gender was not established to be a moderator on the stated relationships.

Gender was established as a moderator in testing the relationship between research productivity and the years an individual. In the study, the relationship was established to be stronger amongst male participants (Callaghan, 2017b). Gender was reported to be a moderator in various relationships and no moderation was established in other studies.

According to Callaghan (2017), working contexts in all parts of South Africa are "equalising" concerning the past concerning inequality and apartheid. There is a need for research that contributes to knowledge concerning the reduction of inequality mainly in the context of gender. Using and investigating gender and understanding its function in various contexts and relationships in South Africa can be of great importance (Callaghan, 2016b).

In a South African context, findings by Du Plooy and Roodt (2013) on gender established no moderating effects on the relationship between work engagement, burnout and turnover intentions, contradicting various studies establishing moderating effects of gender in predicting turnover intentions (Almer & Kaplan, 2002; Cotton & Tuttle, 1986; Emiroğlu, Akova & Tanrıverdi, 2015; Igbaria & Guimaraes, 1993; Karatepe *et al*., 2006; Maheshwari, Patel & Bhinder, 2015). Also, various research studies have established no significant relationship

between gender and turnover intention (Joseph, Ng, Koh & Ang 2007; Martin & Roodt 2008; Porter, Steers, Mowday, & Boulian, 1974). On the basis of the literature provided, the following hypothesis is suggested:

H8: Gender moderates the relationship between innovativeness of an individual and turnover intentions among continuous learners.

Peltokorpi, Allen and Froese (2015), established that gender assisted the explanation of the association that exists between embeddedness and turnover intentions as a weaker relationship was established for women. In a study conducted by Dhanpat, Modau, Lugisani, Mabojane and Phiri (2018), male respondents were established to have greater levels of turnover intentions when compared to women.

This study investigates the current inconsistencies concerning the effects and functions of gender in an employee's turnover intentions in various conditions and contexts.

2.8.3 Education

Maheshwari, Patel and Bhinder (2015) found that the education level of employees has an influence on their decision to either stay or resign from their organisation.

Jayasingam and Yong (2013) established that employees with university degrees had a smaller likelihood of leaving the organisation. According to Islam, Khan, Ahmad and Ahmed (2013), a different result was established, as individuals with higher levels of education were established to have a higher propensity to leave their employer. In a study by Du Plooy and Roodt (2013), education levels were not established as a moderator on the relationship between work engagement, burnout and turnover intentions. These findings are contradicted by various authors who established education levels to influence turnover intentions (Bester 2012; Emiroğlu, Akova & Tanrıverdi, 2015; Igbaria & Guimaraes, 1993). On the basis of this literature, the following hypothesis is derived:

H9: Education moderates the relationship between innovativeness of an individual and turnover intentions among continuous learners.

In a study conducted by Cavanagh and Coffin (1992), there was an indication of higher turnover rates for nurses that had a higher level of education. Education levels were established not to influence an employee's decision to either stay or quit their job (Volk & Lucas, 1991).

There is uncertainty regarding the effects of education on turnover intentions as no concrete agreement was met in various studies that investigated the effects of education. This study hopes to investigate further on education's function in determining turnover intentions. The proposed relationships may change over time, as individuals completes their qualifications and insights on the potential change in the relationship is required.

2.8.4   Tenure

An employee's tenure in an organisation was constantly associated with retention and in a study the authors conducted, it was established that employees at different levels of tenure had different turnover intentions perceptions (Maheshwari, Patel & Bhinder, 2015). Similarly, various studies concur with findings which revealed that employees that were longer tenured had a stronger tendency to stay in an organisation and employees with short tenure demonstrated higher levels of turnover intention (Emiroğlu, Akova & Tanrıverdi, 2015; Karatepe *et al*., 2006; Krecker, 1994; Somers, 1996). The following hypothesis is derived on the basis of this literature:

H10: Tenure moderates the relationship between innovativeness of an individual and turnover intentions among continuous learners.

The length of tenure was established to be a moderator in the relationship between employee voice and turnover intentions (Avery, McKay, Wilson, Volpone & Killham, 2011).This study aims to determine if tenure can serve as a moderator in a differen relationship still predicting turnover intentions. According to Maden (2014), employees with a long length of tenure are hesitant to resign attributable to the collection of organisational investments. Furthermore, individuals with longer tenure had less propensity to resign because of their investment in the organisation after several years (Óskarsdóttir, 2015).

Also, it was established that nurses with longer tenure were more likely to stay in their place of employment (Chan & Morrison, 2000). According to Hayes (2015), retention strategies need to be developed for organisations to increase the length of tenure of employees. Furthermore, individuals with longer tenure were associated with a smaller likelihood of intending to leave the organisation when compared to individuals with shorter tenure (Karlsson, 2008).

Perez (2008) also established that the longer an employee is with an employer the less likely they are to desire to leave the organisation. There are inconsistencies concerning the function

that tenure has on innovative work behaviour. The moderating effects of tenure were established concerning innovative work behaviour and personality traits as employees were established to generate more ideas if they had a longer tenure (Woods, Mustafa, Anderson & Sayer, 2018). This contradicted findings which established that shorter tenure was concerning employees being more innovative (Usman & Hussain, 2017).

2.8.5   Job Type

According to Nijenhuis (2015) innovative work behaviour could be impacted by the type of task description and work function possessed by the employee. Kanter (1988) suggest that the duties that come with an employee's position can either stimulate or inhibit innovation since certain work function innovation comprise a prerequisite to effectively perform the job. Certain work functions would be required to be more innovative when compared to other functions. Rosing, Rosenbusch and Frese (2010) suggest that ambidexterity is essential in the innovation process at an individual level. They propose that the paradoxes of innovation are in achieving balance between new and old activities and between routine and unstructured activities.

On the basis of this literature, the following hypothesis is proposed:

H11: Type of work moderates the relationship between innovativeness of an individual and turnover intentions among continuous learners.

Shalley and Gilson (2004) reveal that employees have a stronger tendency to look at alternative solutions and put in more effort into their job when they have a job complex and challenging, as they are exposed to more opportunities to learn which in return encourages innovativeness when compared to employees who have routine work.

Humphrey, Nahrgang and Morgeson (2007) established that employees with complex jobs have less tendency to quit their organisation, as job complexity was established to be concerning intrinsic motivation, job satisfaction and the extent to which knowledge workers are involved in their jobs.

2.9   CONCLUSION

This literature review has highlighted the costs that are associated with turnover intentions as well as presented turnover intention theories found to be related to the current study. In addition, this chapter has discussed various factors that are important in the prediction of turnover intentions. Specifically, innovative work behaviour was defined and the links to turnover intentions were presented. Also, literature surrounding the potential mediating effect of perceived supervisor support and job satisfaction were outlined. This chapter proceeded to present literature relating to core self-evaluation and how it has been found to relate to the turnover intentions of employees. Literature pertaining to the moderating effects of core self-evaluation, distributive justice, experiential variables and type of work were presented. Moreover, the various hypothesis were derived in this chapter in each specific section across all the different factors.

Furthermore, this review highlighted the existing inconsistency around the topic and has demonstrated the need for the various variables to be investigated to determine whether there is a relationship among variables.

The next chapter will present the research methodology that was implemented for this study.

CHAPTER 3

RESEARCH METHODOLOGY

3.1 INTRODUCTION

The preceding chapter presented the literature review on job satisfaction, perceived supervisor support, core-self-evaluations, demographic variables and their effect on innovative work behaviour and turnover intentions. This chapter will focus on the research methodology pertaining to the current study.

The aim of this research was to test theory predicting the relationships between individual innovative work behaviour and turnover intentions between employees.

The research questions for this study were devised in Chapter 1. These are reiterated:

1. *Research Question 1: To what extent does individuals' innovation influence turnover intentions?*
2. *Research Question 2: To what extent does job satisfaction and perceived supervisor support mediate the relationship between individuals' innovation and turnover intentions among continuous learners?*
3. *Research Question 3: To what extent do core self-evaluations influence turnover intentions among continuous learners?*
4. *Research Question 4: To what extent do perceived distributive justice, core self-evaluations, experiential variables and type of work moderate the relationship between individuals' innovation and turnover intentions among continuous learners?*

This chapter justifies the research methods considered to be appropriate for the study. Also, the several stages of the research are outlined such as the selection of population and sample and the data collection and analysis process. Furthermore, the instrumentation established suitable for this study is presented. This chapter ends with a discussion of the various ethical aspects that were considered throughout the research as well an identification of possible methodological limitations that the study may be exposed to.

The following section will outline the actions that will be taken to investigate the research problem discussed and the reasoning behind the chosen actions.

3.2 PARADIGMATIC LOCATION OF THE RESEARCH

According to Kuhn (1962) a paradigm is a term used to represent a specific way of thinking shared by a group of scientists in resolving concerns in their field. Guba (1990) holds that

paradigms can be characterised by ontology, epistemology and methodology. Antwi and Hamza (2015) explains that ontology is associated with what the nature of reality is, epistemology refers to the posing of questions regarding what can be regarded as knowledge and what the relation is between the researcher and what is known. Also, methodology refers to how the researcher will go about discovering what they believe can be known (Antwi & Hamza, 2015).

This study is located within the functionalist or realist paradigm (Burrell and Morgan, 1979). According to Burrell and Morgan (1979), the functionalist paradigm can be characterised in the notion of realism for the ontological assumption, positivist approach for the epistemology assumption and determinist for the assumption of human nature. There is an assumption of objectivity in the attaining of knowledge and the existence of a social world not dependent on the researcher. The paradigm holds an impartial point of view with an aim of providing a rational account of social affairs. There is a degree of practicality associated with the functionalist perspective as there is a focus in comprehending society and creating knowledge applicable.

The authors suggest that the nature of social science can be associated with four groups of assumptions (Burrell & Morgan, 1979). According to the authors, the research orientation for each assumption can either be objective or subjective.

3.2.1 Ontology

These assumptions are concerned with the core of the phenomena being investigated. Realism and nominalism are the two ontological positions that can be distinguished (Burrell and Morgan, 1976). The assumption that the social world possesses its own reality is associated with the realist position which assumes that social structures exist independently. On the other hand, nominalism assumes that the existence of the social world is dependent on the names we attribute to it to aid us to deal with the social world.

3.2.2 Epistemology

Epistemology focusses on what comprises valid knowledge of the world and how the world can be understood. This assumption revolves concerning how individuals come to grasp the world and the way this understanding is communicated (Burrell and Morgan, 1979). There are often debates regarding whether knowledge is to be conveyed as facts or if it is to be experienced personally.

Anti-positivism and positivism are the two epistemological positions identified by Burrell and Morgan (1979). In a positivist approach, it is recommended to investigate regularities inside the social world. Also, a hypothesis is used to confirm or disprove claims concerning regularities. On the other hand, the anti-positivist approach is opposed to the idea that there are any laws describing the social world. There is a disbelief that knowledge can be attained by means of observing social activities externally.

3.2.3   Human Nature

Burrell and Morgan (1979) explain the human nature assumption as the referral of the relationship amid individuals and their setting. The two notions concerning human nature include voluntarism and determinism. Determinism alludes to the belief that individuals' settings are in control whilst voluntarism assumes volition amongst actors in total control of their fate.

3.2.4   Methodological Approach

The three assumptions discussed above were identified to have direct implications on the methodological approach.

Each assumption has significant consequences in the manner that individuals will investigate and attain knowledge about the social world. There will be an inclination towards diverse methodologies depending on the ontological approach, the epistemological approach and the view of human nature.

According to McGregor and Murnane (2010) the post-positivistic research acknowledges that there are various ways of knowing apart from the use of scientific methods. Although post-positivists still support beliefs about the significance of both objectivity and generalisability, they suggest that researchers should adjust their claims to understanding of the truth based on probability and not with certainty (Mertens, 2014). Post-positivists suggest that research will at no time be certain and a post-positivist will try and represent reality to the best of their ability rather than finding the truth (Muijs, 2010)

Chilisa and Kawulich (2012) emphasise assumptions of post-positivists which include ontology, where there is agreement on the existence of reality but acknowledgement that the knowing will be flawed attributable to the limitations that arise from having a human researcher. Also, for epistemology post-positivists assume that ideal objectivity cannot be

realised but is approachable. For methodology, the assumption is that purpose of the research is the prediction of results, theory testing or finding the strength of relationships between variables.

Callaghan (2016c) emphasises certain shortcomings of locating work with the use of Burrell and Morgan (1979) framework. Callaghan explains that the internet has enabled new social forces which have fostered methodologies which remain unplaced in the schema of Burrell and Morgan. Theorists using the framework to locate their research do so with the lack of literature that accounts for the occurrences.

Furthermore, Callaghan (2016c) argues that the Burrell and Morgan's (1979) paradigmatic differentiation precedes crucial evolutions within organisational theory and offers further paradigms to supplement the Burrell and Morgan schema modernising the ontological and epistemological realities.

3.3   RESEARCH DESIGN

In conducting research, the most recurring approaches include qualitative, quantitative and combined methods (Williams, 2007). Quantitative research was widely used in the creation of meaning and knowledge through uncovering the data collected within the study in an objective manner. Furthermore, quantitative research methods entail taking a statistical viewpoint to research design beginning with a statement of a problem and includes the formulation of a hypothesis, review of literature and analysing data quantitatively. Data is used to provide an objective measure of reality as the research is independent from the researcher (Williams, 2007).

For the purpose of this study, a quantitative research approach was used. According to Schulze (2003), this approach is ideal for the testing of theory and developing general statements. This is supported by Williams (2007) who shows that the results from a quantitative research can explain, predict or confirm theory. As a result, generalisable results across contexts are produced through quantitative studies.

Yilmaz (2013) claims that when a case is described with the use of numerical data, it can be referred to as quantitative research. According to the author, objective epistemology informs quantitative research. Furthermore, the quantitative approach takes the stance that reality is to be investigated in an objective manner and distance is required between the researcher and

what is being investigated. The quantitative approach is established to have a realist perspective whilst a qualitative approach is established to have a subjective perspective (Muijs, 2010). Also, a quantitative approach allows the study to acquire an extensive range of findings and concisely present them with the use of statistics in the analysis of data (Yilmaz, 2013).

According to Williams (2011), quantitative research produces meaning through the objectivity uncovered in the data collected. Müller (2011) suggests that quantitative research is suitable when the purpose of the study is to test a predictive type of hypothesis which is in alignment with the objectives of the current study. According to Antwi and Hamza (2015), the focus of the quantitative research approach is on testing theory and hypothesis in hopes to reveal whether it is supported with the use of empirical information. Furthermore, cross-sectional studies are quick and inexpensive to perform (Sedgwick, 2014).

Mafuwane (2012) emphasises that quantitative research results are often replicable irrespective of who conducts the research attributable to the researcher being external to the actual research. In addition, quantitative research provides data both objective and generalisable which will allow for inferences to be made from observations (Carr, 1994; Polit & Beck, 2010). As a result, the data may be used to effectively look at relationships between variables and make adequate conclusions. The quantitative approach poses certain limitations. According to Rahman (2016), deeper clarifications and meanings cannot be collected from a quantitative study.

A qualitative approach was not established suitable for this study as in-depth knowledge was not required to be obtained as the study aimed to test theory and analyse the information statistically and not to gain a deeper understanding of the relationships. Furthermore, a qualitative approach would not allow the results of this study to be generalisable and because, a quantitative study was deemed appropriate as this method involves testing hypothesis to determine relationships amongst innovative work behaviour, turnover intentions and the various demographic and contextual factors.

3.3.1 Design of the Study

According to Creswell (2012), correlational designs are suitable when the aim of the research is to associate two or more variables to study the effect the variables have on each other. Correlational designs can either be predictive or explanatory. Furthermore, there are two types of survey designs which include longitudinal and cross-sectional. For the purpose of this study,

a cross-sectional survey design was utilised as the data which is ideal on obtaining current perspectives and beliefs of individuals (Creswell, 2012).

3.3.2 Scope of the Study

The range of the study is bound according to its focus: on the relationships between turnover intentions and (i) innovative work behaviour; (ii) job satisfaction; (iii) perceived supervisor support; and (iv) various contextual factors. The research sampled working students studying part-time at the University of the Witwatersrand.

3.3.3 Population and Sample

A population refers to the total of all the individuals who have certain characteristics and are of interest to a researcher (Kadam & Bhalerao, 2010). The population comprised learners that were currently enrolled at the University of the Witwatersrand studying on a part-time basis. The population size comprised an estimated 1100 students that were enrolled at the Centre for Part-time Studies at the university.

3.3.4 The Sample

According to Kadam and Bhalerao (2010) a sample is a subset of the population of which the researchers would like to include in a study. From the population, the researcher made use of census sampling with an attempt to sample the entire population. The researcher honoured refusals and respected the voluntary aspect of the research and obtained the sample it did for the study.

Learners were sampled using hard copies that they were required to fill in to avoid common method bias. The sample comprised learners currently enrolled the University of the Witwatersrand are studying business career related subjects undertaking evening classes.

According to Binu, Mayya and Dhar (2014) the following formula can be used to obtain a minimum sample size.

Sample size $= \dfrac{Z_{1-\alpha/2}^2 \, SD^2}{d^2}$

$Z_{1-\alpha/2} = 1.96$

SD = turnover intention variable as of previous study was 0.41 (Agoi, 2015)

D= absolute error or precision - 5%

Sample Size = 1.962 (0.41)2

$\qquad$ (0.05)2

A minimum sample size of 258.31 rounded to 259 respondents was required to obtain a test of relationships at a 5% level of significance. This is merely a baseline ensuring a larger sample. A total of 326 questionnaires were collected from participants, placing the size above the established minimum required number of participants.

Furthermore, this study made use of SEM which needs a sample size larger when compared to certain statistical techniques to produce trustworthy results. According to Noronha (2015), it is advisable for 15 participants to be collected for each variable measured. This study used nine measured variables including the variables placed for common method bias purposes. Therefore, 135 participants were required for SEM and the sample obtained is above the limit specified.

3.3.5 Statistical Power

According to Kline (2015), to have adequate statistical power there needs to be about two hundred cases as means of ensuring validity of the statistical methods. This study obtained 326 which offers adequate statistical power.

3.3.6 Criteria for Sampling

Within the sample, a criterion was required for participants to participate in the study. Participants were required to be studying part-time and working simultaneously.

3.3.7 Confidence Levels of Testing

A five per cent level of significance or $\alpha = 0.05$ was used for this study. According to Kim (2015), the level of significance is a critical contributor in the testing of hypotheses as it controls the power of the test and critical value, thus having an effect on the inferential outcome.

3.3.8   Pilot Study

To obtain an indication of whether the research was proceeding the right course, before the collection of the main questionnaires, a pilot study was conducted. The researcher distributed 30 questionnaires (n=30) to participants with similar characteristics as the sample who proceeded to complete the questionnaire. The purpose of the pilot study was to determine the estimated time for completion and test the reliability of the instruments and design of the data collection instrument. The results of the pilot study indicated no indications of problems with the questionnaire.

3.4   INSTRUMENTATION

Separate scales were used to measure the specific variables in the study which included turnover intention, job satisfaction, innovative work behaviour, distributive justice, perceived supervisor support and core-self-evaluations. This section outlines each scale and reports on the Cronbach alphas and provides examples of the type of questions included in the scales.

The demographic section of the questionnaire included 13 questions that concerning individual's personal information such as gender, age, level of seniority and highest qualification of participants and that of their parents.

3.4.1   Turnover Intentions

Turnover intentions were measured with a scale developed by Mobley, Horner and Hollingsworth (1978). The scale comprises three items measured in a 5-point Likert scale which comprises questions such as "I often think about quitting my present job". Various studies reported the Cronbach alpha to be 0.9 (Mobley, Horner &Hollingsworth, 1978; Yin-Fah, Foon, Chee-Leong, & Osman, 2010). Furthermore, Abid and Butt (2017) reported a Cronbach alpha of 0.81 and Balogun and Olowodunoye (2012) reported a Cronbach alpha of 0.71. All the various studies have established the turnover intention scale reliability to be above the recommended threshold. In the current study, a Cronbach alpha value of 0.843 was reported.

3.4.2   Job Satisfaction

The Minnesota Job Satisfaction Scale was used to measure job satisfaction. The Minnesota Questionnaire has three forms used in research, including a short version of a 5-point Likert scale with 20 items, the one utilised for this study developed by Weiss, Dawis,. England, &

Lofquist (1967) and described in the Manual for the Minnesota Satisfaction Questionnaire. The Cronbach alpha was reported to be 0.91 (George, 2013). The scale requires respondents to select how satisfied they are with various aspects of the job such as "the chance to do different things from time to time". In a South African context, a study reported a Cronbach alpha of 0.86 (Buitendach & Rothmann, 2009). In the case of the current study, a Cronbach alpha value of 0.857 was reported.

3.4.3 Innovative work behaviour

For innovative work behaviour, the 9-item scale developed by Janssen (2000) was used. The innovative work behaviour scale was used in various studies who have all reported the reliability of the scale to be above the recommended threshold. Hsiao, Chang, Tu & Chen (2011) reported a Cronbach alpha value of 0.91, Janssen (2000) reported a value of 0.94, June & Kheng (2013). Furthermore, in a study conducted by Khaola & Sephelane (2013) a Cronbach alpha value of 0.96 was reported. The scale comprises three components, which are idea generation, idea promotion and idea implementation. The scale comprises items such as "I create new ideas for difficult issues". A Cronbach alpha value of 0.917 was reported in the current study.

3.4.4 Distributive Justice

Distributive justice was measured with the use of a 5-item scale developed by Moorman (1991). A 7-point Likert scale was used for respondents to rate their level of agreement with the statements which include for example, "My work schedule is fair". Moorman (1991) reported a Cronbach alpha of 0.90. The current study reported a Cronbach alpha value of 0.856.

3.4.5 Perceived Supervisor Support

Perceived supervisor support will be measured using a 7-item scale developed by Saunders, Sheppard, Knight and Roth (1992) which is a dimension of the Supervisor as Voice Manager scale. A 7-point Likert scale that ranges from 1= strongly disagree and 7 = strongly agree. An example of scale items includes "My supervisor is open and fair when I submit an idea". Janssen (2005) reported a Cronbach alpha of 0.95.

3.4.6 Core-Self-Evaluations

Core-self-evaluations will be measured using the 12-item core-self-evaluation scale developed and validated by Judge, Erez, Bono and Thoresen (2003). The items from this scale were

designed to measure an individual's self- regard by assessing self-esteem, self-efficacy, locus of control and neuroticism. A Cronbach alpha of 0.71 was established when the scale was used amongst Iranian employees (Sheykhshabani, 2011). Also, Sharma and Misra (2017) established a Cronbach alpha of 0.88 with Indian IT employees as the sample. The current study reported a Cronbach alpha value of 0.678.

3.4.7 Job Type

Lastly, job type was measured with the use of a 4-item scale developed by Morgeson and Humphrey (2006) referred to as the Work Design Questionnaire (WDQ). Specifically, this study will use the job complexity aspect of the questionnaire to measure how complex individuals' jobs are or if they are routine based. The items are reverse-scored on a 5-point Likert scale. Sample items include "The job requires that I only do one task or activity at a time". The Cronbach alpha was established to be 0.80, 0.70,0.79 and 0.87 respectively in various studies that made use of the job complexity items of the WDQ. (Bayona, Caballer & Peiró, 2015; Franken, 2011; Miranda, 2015; Morgeson & Humphrey, 2006).

The study used the original scale lengths of the various scales and cannot be standardised as it will compromise the validity of the scale and limit the comparison to studies that have previously used the scale.

3.4.8 Social Desirability

According to Johnson, Fendrich and Hubbell (2002), when individuals are inclined to project favourable images of themselves during social interactions, this is regarded as social desirability.

For the purpose of this study, the Marlowe Crowne Scale was utilised, and it is amongst the oldest and most frequently used scales concerning social desirability. Specifically, the 10-item version of the scale was utilised (Crowne & Marlowe, 1960).

3.4.9 PANAS

This study made use of a 10-item Positive and Negative Affect Schedule (PANAS) scale to measure the negative affect schedule. Specifically, the five adjectives measuring negative affect were incorporated in the study which included finding the emotions of respondents concerning being afraid, upset, nervous, scared and distressed in a 5-point Likert scale, with

'not at all' being the lowest rating and 'extremely' being the highest to be rated. This short form of the scale was created by Kercher (1992).

3.5 DATA COLLECTION

The sample for this study entailed 326 employees currently working and studying simultaneously in Gauteng. A questionnaire that comprised a demographic section and measured job satisfaction, core-self-evaluations, job complexity, turnover intentions, perceived supervisor support, distributive justice and innovative work behaviour was physically and electronically distributed amongst respondents.

The online survey was completed by 124 respondents and the remaining 206 questionnaires were filled in through hard copy. The online raw data was then retrieved from the Google form through an Excel spreadsheet. For the hard copies, the researcher physically captured the data into an Excel spreadsheet which was then imported to the statistical programmes used to conduct the statistical analysis. These statistical programmes include SPSS (version 25) and IBM SPSS AMOS (Version 25).

The next section will outline the process that the researcher followed concerning the collection of the hard copies of the questionnaire and what was taken into consideration during the process.

3.5.1 Distribution

 The researcher distributed hard copies of the questionnaire to learners for this completion during lectures that were arranged with necessary stakeholders. In addition, to ensure consistency on how participants experience the questionnaire a sampling protocol was put in place.

The electronic version of the questionnaire only allowed for one response per question. The link to the questionnaire was sent through email which requested their participation in the study with the assistance of administrative officers. Respondents had to follow the link to gain access to the Google form version of the questionnaire.

3.5.2 Documentation

A participant information sheet was included at the beginning of the questionnaire. This sheet included the aims and purpose of the study, the criteria for participation, concerns relating to the anonymity and confidentiality, administrative information such as the researchers Ethics Committee protocol number and the voluntary nature of the research. (See Appendix A.)

Furthermore, consent was required for both versions of the questionnaire. For the electronic version, participants had to consent to participating before they could proceed to the actual questionnaire by selecting the option "accept". For the hard copies of the questionnaire, a consent form was attached to the questionnaire which required respondents to fill in. The consent form did not require any identifying information to be provided and provided participants the option to use the symbol "X" in areas they were not comfortable in providing information. (See Appendix B.)

3.5.3 Permission

Written permission was obtained from relevant stakeholders to conduct the study, specifically from the Registrar to allow for the researcher to conduct the research at the university (see Appendix D). Furthermore, permission was obtained from Wits Plus to allow the researcher to conduct the research using the Wits Plus students. In addition, permission was obtained from the Wits Plus lecturers to survey the students during their lecturing times.

3.5.4 Briefing

The researcher briefed the respondents on their rights and ensure they were aware that their participation in the research was voluntary and explain to the participants the procedure for completing the questionnaire.

Concerning the electronic forms, instructions were placed at the beginning of the survey before participants could proceed to the completion of the questionnaire. The researcher was unable to be present during the electronic surveys. The study endeavoured to reduce possible queries and misunderstandings that may have occurred during the completion of questionnaires by piloting the questionnaire before proceeding to collect the data.

Various studies used a similar process of conducting research where there was a clear outline on how permission was to be obtained, the necessary documentation required and how the researcher would brief and distribute the questionnaires (Banken, 2010; De Klerk, 2013).

3.6 RELIABILITY AND VALIDITY

3.6.1 Reliability

Reliability refers to the degree to which measures are error free, consistent and repeatable (Thanasegaran, 2009). To ensure reliability, the results of the study will utilise the SPSS and Cronbach's alpha tests to confirm the internal consistency of the instrument. According to Padenga (2016), testing for reliability assists in eradicating scale items unnecessary in the measurement of the latent variables in the study. Good reliability was identified to be values of 0.7 and higher as a rule of thumb (Noronha, 2015).

According to Heale and Twycross (2015), the degree to which a concept is correctly measured in a quantitative study is referred to as validity. Kimberlin and Winterstein (2008) define validity as the extent to which an instrument assesses what it was set to measure and needs an instrument to be reliable. The study will make provision for validity through ensuring face, construct, content, convergent and divergent validity.

3.6.2 Face Validity

Noronha (2015) reveals that face validity is regarded as the most essential validity test since for measurement theory to be appropriately specified, there needs to be a great understanding on the meaning of each item.

Face validity refers to the degree to which the test appears as relevant to the individuals answering the test and if it appears to measure what it was set to measure (Holden, 2010). Face validity was ensured through piloting the test to ensure that the researcher was pointed to the questions that respondents may have perceived as vague.

3.6.3 Convergent Validity

Convergent validity is concerned with whether there is convergence amongst instruments that assess the same construct (Maroof, 2012). The size of factor loadings is essential in the consideration of convergent validity, so when items load on a factor it will be an indication of convergence on a mutual point and therefore will be retained (Noronha, 2015). According to Awang (2012), convergent validity can be verified through the significance of the measurement model and obtaining the average variance extracted from each construct which should report to be higher than 0.5.

3.6.4 Divergent Validity

Divergent validity is concerned with whether there is divergence in measures of constructs meant to be unrelated (Maroof, 2012). To ensure both convergent and divergent validity the research made use of confirmatory factor analysis.

Discriminant validity is established to be present when there is a weak correlation amongst the various instruments measuring different constructs within a study (Chiu *et al*., 2005). There is confirmation of discriminant validity when there is an establishment that a test does not assess a construct that it was not intended to measure (Hatcher, 1994). Awang (2012) stipulates that correlations between variables exogenous should not surpass 0.85 to achieve discriminant validity.

3.6.5 Content Validity

Content validity is concerning how efficiently an instrument can incorporate all theoretical aspects of a construct (Heale & Twycross, 2015; Maroof, 2012). The researcher made sure that the items of the questions appropriately sampled what was intended to be sampled (Callaghan, 2014).

3.6.6 Construct Validity

Lastly, construct validity examines theoretical relationship of a variable to other variables (Thanasegaran, 2009). The researcher made cautious comparisons of the survey items with the conceptual constructs from which they were obtained. Furthermore, when the required thresholds for the fitness indexes are met, construct validity is achieved (Awang, 2012).

3.7 COMMON METHOD BIAS

According to Podsakoff, MacKenzie, Lee and Podsakoff (2003) method biases is a concern since they are amongst the main origins of measurement error. Since the current study made use of self-reported questionnaires in which common method bias was attributed as a common feature, it is imperative that provision for common method bias is made.

3.7.1 Common Method Bias

3.7.1.1 Harman Single-Factor Test

In order to gauge whether common method variance would pose a serious threat in the research conducted, a Harman's single-factor test was used. According to Podsakoff *et al.*, (2003) if one principal factor explains a greater amount of the total variance, it is an indication of the existence of common method bias within the study.

The Harman Single-Factor test is frequently used by researchers to inspect the common method variance in the studies. This test serves only to emphasise whether common method variance is present in the study and cannot correct the common method bias that may exist in the study (Tehseen, Ramayah and Sajilan, 2017). The Harman single-factor analysis was accomplished following the collection of data to examine whether one factor explains the variance in the data (Chang, Van Witteloostuijn & Eden, 2010).

3.8 DATA ANALYSIS PROCEDURES

This section outlines the steps that were accomplished in preparation of the analysis of data. In addition, the motivation for the analysis procedures is also outlined. The SPSS was used to analyse the data. This research involved both descriptive and inferential statistics. Descriptive statistics were used to describe the basic characteristics of the data in the study. Inferential statistics were used to make inferences from the data of the study.

3.8.1 Hypotheses

The main research question of this study is: To what extent does innovative work behaviour influence turnover intentions of employees? From the main question, secondary research questions were derived. In connection to theoretical model, the hypotheses are presented below.

Hypothesis 1 is derived from the research question above.

H1: There is a significant association between innovativeness and turnover intentions amongst continuous learners.

H2: Perceived Supervisor Support mediates the relationship between individuals' innovation and turnover intentions amongst continuous learners.

H3: Job Satisfaction mediates the relationship between innovativeness of an individual' and turnover intentions amongst continuous learners.

H4: There is a significant association between core-self-evaluations and turnover intentions amongst continuous learners.

H5: Perceived distributive justice moderates the relationship between individuals' innovation and turnover intentions amongst continuous learners.

H6: Core-self-evaluations moderate the relationship between individuals' innovation and turnover intentions amongst continuous learners.

H7: Age moderates the relationship between individuals' innovation and turnover intentions amongst continuous learners.

H8: Gender moderates the relationship between individuals' innovation and turnover intentions amongst continuous learners.

H9: Education moderates the relationship between individuals' innovation and turnover intentions amongst continuous learners.

H10: Tenure moderates the relationship between individuals' innovation and turnover intentions amongst continuous learners.

H11: Type of work moderates the relationship between individuals' innovation and turnover intentions amongst continuous learners.

The aforementioned hypotheses were properly outlined in the previous chapter (Chapter 2 - Literature Review). A 5% significance level was used to determine if the hypotheses were supported.

3.8.2 Control Variables

Staines, Pottick and Fudge (1986) indicate that the level of qualification, age, gender and tenure of an employee is likely to influence the associations between other variables. As a result, for the study these variables were controlled when testing for relationships between other variables within the study.

3.8.3   Mediator Variables

A third variable can be regarded as a significant mediator when it fully or partly explains the relationship between the independent and dependent variable in the chain of causation (Cheong & MacKinnon, 2012). According to the authors, mediators intervene in the relation between the dependent and independent variable and because impact the effect of the predictor variable.

According to Mackinnon (2008), when an independent variable causes the mediator which subsequently causes the dependent variable, it is considered to be a mediation relationship. Furthermore, a variable that conveys the effect of an independent variable to the dependent variable is assumed to be a mediator (MacKinnon, Coxe & Baraldi, 2012).

3.8.4   Moderating Variables

Baron and Kennedy (1986) define a moderator as a variable that influences the strength and the course of a relationship between an independent and dependent variable.

Baloyi, Van Waveren and Chan (2014) simplify the difference between a mediator and moderator. According to the authors, a moderator influences the course and strength of a relationship between an independent and dependent variable. On the other hand, a mediator to a great degree accounts for the relationship between independent and dependent variables.

3.8.5   Data Entry

Prior to transferring the data into SPSS, the various variables were named and well defined.

3.8.6   Statistical Procedures

Based on the summary of statistical analysis techniques used in various studies with similar variables as those included in the current study, it is evident that correlation and multiple regression techniques are what are commonly used in studies concerning the variables. It is imperative that there is further investigation with the use of more advanced statistical analysis techniques.

Various multivariate analysis were executed in attempts to determine the associations between the variables in the study. Included in these are Exploratory Factory Analysis, Confirmatory Factory Analysis and Structural Equation Modelling (SEM). An elaboration of the mentioned analysis is presented below.

According to Padenga (2016), prior to developing the structural model, there are assumptions that require to be met which will require tests to be conducted that check for (i) outliers; (ii) linearity between variables; (iii) homoscedasticity; and (iv) multicollinearity.

3.8.7   Exploratory Factor Analysis

This analysis is accomplished before proceeding to analysis in SEM. There are two objectives in the use of factor analysis (Roux, 2010). Primarily, it is applied to establish underlying relationships amongst several items, and it is utilised to detect if the information can be condensed into less items without compromising the explained variance. According to Safiih and Azreen (2016), factor analysis is a commonly used statistical method in research, comprising questionnaires.

3.8.8   Confirmatory Factor Analysis

According to Ullman (2006) a CFA is often accomplished once the associations that were hypothesised were established between the variables that will be measured and constructs underlying. According to Schreiber, Nora, Stage, Barlow and King (2006), a main element of a CFA lies in addressing concerns of reliability and validity of the variables observed in a study. Furthermore, the CFA is used to investigate the degree of interrelationships and covariance amongst the latent variables.

CFA can be used for amongst other things the validation of a construct and the assessment of measurement invariance. Furthermore, the underlying aspects of the instrument and factor loadings are verified by the CFA (Brown & Moore, 2012).

According to Noronha (2015), the appropriateness of each latent construct is presented through conducting a CFA of the measurement model. A confirmatory analysis was accomplished to examine the structure of the validated scales individually.

3.8.9   Structural Equation Modelling

According to Hooper, Coughlan and Mullen (2008), SEM is amongst the preferred techniques amongst researchers across disciplines and is gradually becoming a necessity in social sciences. No consensus was reached concerning model fit and how data are best represented by the model.

SEM is an addition to the general linear model (Noronha, 2015). According to Tomarken and Waller (2005), SEM allows for the testing of complex models which include various mediators and provides numerous marks of global model fit, unlike the use of multiple regression. Furthermore, the significant relationships amongst latent variables can be established with the use of SEM (Chiu *et al*., 2005).

SEM simultaneously examines all the variables in a model (Mizrahi, 2018). According to Castor (2009), SEM takes a confirmative approach in the analysis of data unlike the descriptive nature most multivariate procedures take. Also, SEM makes provision for estimates concerning the assessment and correction of measurement error which conventional multivariate procedures are unable to make provision for.

SEM, in contrast with the CFA, expands the probability of associations between the latent variables. Furthermore, there are two parts of SEM, which include the measurement model, which is also regarded as the CFA and the structural model (Lambert, 2015; Schreiber at al., 2006).

Ullman (2006) emphasises various advantages that come with the use of SEM. Firstly, SEM estimates and removes error which provides for an examination of the various factors free of measurement error. Secondly, through the removal and estimation of measurement error the reliability of the measurement is clearly accounted for within the analysis. Lastly, SEM is the sole analysis that allows for concurrent and complete tests of all the relationships in more complex phenomena (Edwards, Wirth, Houts & Xi, 2012; Ullman, 2006).

Edwards *et al*. (2012) emphasise the differences between multiple linear regression and SEM. When measurement error is considered in a regression model, it can be regarded as a structural equation model. Furthermore, multiple regression equations can be contained in SEM when compared to multiple linear regression where only one regression equation is contained, making it more sophisticated.

SEM generalises, integrates and extends on the familiar statistical models. SEM cannot be regarded as independent from the statistical models familiar, such as multiple linear regression and analysis of variance. As a result, the various modes of analysis could produce identical results (Hoyle, 2012).

SEM was performed using SPSS AMOS software. Various studies observing turnover intentions as an outcome variable, used a similar method to analyse data (Banken, 2010; Khawaldeh, Al Muala & Al Ziadat, 2013; Vijayadurai & Alagarsamy, 2014; Zhang & Feng, 2011).

SEM programs offer the opportunity for tests that test the model fit and the tests for individual parameters at the same time (Arbuckle & Wothke, 1999). SEM assesses and evaluates both the structural and measurement model in the same analysis. As a result, this assists in the measurement errors of the observed variables as they are tested as an important part of the model. In addition, SEM allows for complex causal networks that portray realistic processes, which are superior to models correlation based and direct (Cangur & Ercan, 2015; Gefen, Straub & Boudreau, 2000).

3.9   STEPS IN SEM

Various experts agree on specific steps that need to be accomplished in model testing. Included in these is model specification, data preparation, model estimation, model evaluation and modification (Arbuckle & Wothke, 1999; Zhang, 2014). What each step entails is outlined below.

3.9.1   Model Specification and Identification

A hypothesised model is created which explains the various relationships that exist amongst the various variables. This was reported in theoretical model that will be used. Model identification is not considered as step in SEM, but it is something that needs to be taken into consideration prior to proceeding to data preparation (Weston & Gore, 2006).

3.9.2   Data Preparation

Once the model was specified, the data needs to be prepared for analysis. According to Zhang (2014) there are certain concerns regarding data that need to be dealt with which include sample size, data missing and multivariate normality.

For missing data, there needs to be an examination of whether missing data are random. There needs to be a determination of whether data are missing completely at random, missing at random or not missing at random as different patterns would require a different strategy in the analysis of data (de Leeuw & Hox, 2008). The strategies depending on the missing pattern may involve the direct estimation with the use of a maximum likelihood approach or imputation

where the missing values are substituted with values reasonable. In addition, if values are missing at random other strategies such as listwise deletion where cases are deleted from the sample if there are missing values data and pairwise deletion where cases are deleted only when a variable in a calculation is absent can be used (Carter, 2006). In the case of this study, mean and median values were imputed in the cases of missing values.

3.9.3   Model Estimation, Evaluation and Modification

After data preparation there needs to be an estimation of the model parameters; after the estimation there is the evaluation of the model. Model evaluation is one of the most essential steps in SEM and has the objective of determining whether the proposed model offers an acceptable account for the data and whether there is good model fit (Zhang, 2014).

3.9.4   Goodness-of-Fit Measures

3.9.4.1 Absolute Fit Measures

The absolute fit indices aid in determining which suggested model has the best fit. Through the measures a researcher can gain an understanding into how effectively theory proposed is suitable for the data (Hooper, Coughlan & Mullen, 2008). The measures included in this category include Root Mean Square Error of Approximation (RMSEA), Root Mean Square residual (RMR), Standardised root mean square residual (SRMR), chi-squared tests, Goodness-o- Fit index (GFI) and Adjusted Goodness-o- Fit index AGFI (Schermelleh-Engel & Moosbrugger, & Müller, 2003).

In the results section the fit of each construct is assessed individually to determine if there is a presence of any weak items. Thereafter, all the constructs in the model are assessed in concurrence with every other construct to assess if discriminant validity was attained (Hooper, Coughlan & Mullen, 2008).

3.9.4.2 Root Mean Square Error of Approximation

This index considers how complex the model is and provides a reflection of the degrees of freedom. According to when the value is between 0.05 and 0.08, there is an indication of close to good fit and a value less than 0.05 is an indication of good fit (Browne & Cudeck, 1993; Cangur & Ercan, 2015). Hu and Bentler (1999) indicated that values less that 0.06 will suffice to be considered good fit.

3.9.4.3 Incremental Fit Measures

Tucker Lewis Index (TLI)

According to Cangur and Ercan (2015), the greater the value of the TLI, the better the fit for the model. Values higher than 0.95 are taken as acceptable fit and 0.97 was used as the cut-off value amongst various researchers.

Comparative Fit Index (CFI)

A CFI value larger than 0.95 is acceptable fit (Schermelleh-Engel & Moosbrugger, 2003). According to the authors, there is a range from 0 to 1 with higher values being an indication of better fit. The rule of thumb for CFI values to be interpreted as good fit requires a value of 0.97.

3.10 ETHICAL CONSIDERATIONS

Johnson (2014) suggests that to protect the interest of respondents, it is imperative to comply with ethical standards in academic studies.

Various ethical guidelines were adhered to throughout the research. An Ethics Clearance Certificate was obtained from the Ethics Committee. The confidentiality and anonymity of participants were respected and no harm was brought to participants during the research process. Also, the dissertation does not include any information deceptive, to guarantee good quality research. During the collection of data, the participants were made aware that the research was voluntary and were provided the freedom to withdraw at any time. The questionnaires included a covering letter that had the researcher's contact details if participants had any queries or concerns. In addition, informed consent was required from participants and the purpose of the research was clearly outlined to them. Furthermore, concerning the storage and reporting of the collected data, ethical standards were upheld.

3.11 METHODOLOGICAL LIMITATIONS

According to Solem (2015), there are predictive limitations to cross-sectional studies. Their study is not a longitudinal study as participants and information will be retrieved at a single point in time and not across multiple occasions so the results from this study will only generalise to other contexts to the extent to which they are similar to this one. Furthermore, no causation can be deduced from this study as this study will only identify associations.

Also, various potential respondents chose not to partake in the study which may skew the representivity of the sample. According to Sedgwick (2014), cross-sectional studies are more prone to non-response bias attributable to the difference that may exist between respondents who chose to participate in the study and respondents who decline participation. As a result, this may cause lack of satisfactory representivity of the population.

This study utilised a cross-sectional design that prevents the researcher from making causal statements about the associations between our variables and turnover intentions. Researchers could utilise a longitudinal research design to greater depth of understanding of the effect that the variables in this study have on turnover intentions.

3.12 CONCLUSION

In this chapter, an outline of the methodology used for this study was provided and discussed. This chapter conferred the paradigmatic location of the research looking into ontology, epistemology, and human nature. This chapter proceeded to outline the design of the research with justifying the suitability of the research approach chosen and issues pertaining to the population and sample for the current study.

This was followed by a section that outlined each scale and reported on the Cronbach alphas and provided examples of the type of questions included in the scales. Also, the procedure for data collection was explained with a detailed explanation provided for each important aspect in the collection phase which included procedure for obtaining permission, documentation, distribution and briefing of respondents. Following this, a section on reliability and validity was presented which gave a summary of the different forms of validity and how both validity and reliability would be ensured in the study.

Since self-administered are to be utilised in the study, provision for common method bias was made. Therefore, a section discussing common method bias was presented which was followed by data analysis procedures for the study. Towards the end of this chapter, ethical considerations were outlined, and methodological limitations were identified.

Chapter 4 will present the results of the data analysis using the methodology explained in this chapter.

CHAPTER 4

RESULTS

4.1 INTRODUCTION

This chapter comprises various processes that will include the following

- Descriptive data analysis;
- Exploratory factor analysis;
- Confirmatory factor analysis;
- Structural equation modelling;
- Mediation;
- Moderation; and
- Summary of findings.

This chapter will present the results of the statistical analysis conducted. As outlined above, the chapter begins with the descriptive statistics of the surveyed sample which provides information relating to the percentages of respondents that fell under the various demographic categories and the descriptive statistics of the various measured constructs.

Following the presentation of the descriptive statistics, the factor structure of the constructs will be revealed with the use of exploratory factor analysis. In addition, this chapter will follow with the display of the results of the analysis of both the measurement model and the structural model.

4.2 DESCRIPTIVE STATISTICS

This section presents the descriptive statistical analysis, which provides insight into the characteristics of the sample. This section concludes with the presentation of the descriptive statistics of the measurement items.

4.2.1 Demographic Profile

The sample comprised 122 (37.8%) men and 201 women (62.2%). The average age of respondents was 31.74 years. In addition, the majority of the participants were in the age category of below 25 years (28.8%). Concerning race, the percentage of participants from each category were as follows: African (63.4%), Coloured (10.5%), White (14.9%), Indian (9.3%) and 1.9% selected the "other" category. The participants for the study comprised employees from various industries with the most recurring industries being Education, Finance, Banking,

Insurance and Information Technology, which together accounted for 30.5%. Most of the respondents had been with their company for three to five years (18.6%) and in their profession for the same number of years (18.9%). Also, most respondents worked on a full-time basis (79.6%). In addition, most respondents reported to have a matric certificate as the highest attained qualification (27.6%). Furthermore, a majority of the respondents were furthering their studies for personal reasons (69.7%) and supervisory function was the most common category respondents reported to have in their place of work (34.7%). Presented in Table 4.2-1 are these descriptive statistics

Table 4.2-1: Demographic Characteristics of Sample (N=323)

Demographic	Characteristics	N	Percent (%)
Gender	Female	201	62.2
	Male	122	37.8
Age	25 years and below	93	28.8
	26- 30 years old	68	21.1
	31-35 years old	80	24.8
	36- 40 years old	47	14.6
	41- 45 years old	13	4
	Above 45 years	22	6.8
Race	African	204	63.4
	Indian	30	9.3
	Coloured	34	10.5
	White	48	14.9
	Other	6	1.9
Top Industry	Education	25	7.7
	Banking	19	5.9
	Insurance	16	4.9
	Finance	23	7.1
	Information Technology	16	4.9
	Government	10	3.1
	Other Industries	214	66.3

Demographic	Characteristics	N	Percent (%)
Years in Company	Less than a year	28	8.7
	1-2 years	33	10.2
	3-5 years	60	18.6
	6-10 years	52	16.1
	11-20 years	42	13
	Above 20 years	5	1.5
	Missing	103	31.9
Years in Profession	Less than a year	28	8.7
	1-2 years	23	7.1
	3-5 years	61	18.9
	6-10 years	58	18
	11-20 years	48	14.9
	Above 20 years	14	4.3
	Missing	91	28.2
Marital Status	Single	198	61.3
	Married	96	29.7
	Separated	4	1.2
	Widowed/Divorced	10	3.1
	Other	15	4.6
Type of Work	Full-time	257	79.6
	Part time	46	14.2
	Missing	20	6.2
Highest Qualification	Matric Certificate	89	27.6
	Certificate	79	24.5
	Bachelor's Degree	80	24.8
	Honours Degree	44	13.6
	Master's Degree	12	3.7
	PhD	2	0.6
	Other	17	5.3

Demographic	Characteristics	N	Percent (%)
Mother Highest Qualification	Matric Certificate	84	26
	Certificate	46	14.2
	Bachelor's Degree	101	31.3
	Honours Degree	22	6.8
	Master's Degree	13	4.0
	PhD	7	2.2
	Other	50	15.5
Father Highest Qualification	Matric Certificate	75	23.2
	Certificate	42	13
	Bachelor's Degree	114	35.3
	Honours Degree	20	6.2
	Master's Degree	11	3.4
	PhD	3	0.9
	Other	58	18
Top Degrees being studied	Bachelor of Arts	103	31.9
	Bachelor of Commerce	96	29.7
	Master of Commerce	8	2.5
	Other Degrees	116	35.9
Reason for Furthering studies	Promotion	55	17
	Personal	225	69.7
	Required by employer	6	1.9
	Other	37	11.5
Job Title	Entry Level	63	19.5
	Clerical/Administrative	88	27.2
	Supervisor	112	34.7
	Owner of own business	21	6.5
	Partner in own business	6	1.9
	Director/ Vice President/President/CEO	8	2.4
	Missing	25	7.7

4.2.2   Core-Self-evaluations

The measurement scale for core self-evaluations comprised a 12-item scale that were measured on a 5-point scale. Table 4.2-2 presents the mean and standard deviations obtained from the scale.

Table 4.2-2: Core-Self-evaluation

Core-Self-Evaluations			
	N	Mean	Std. Deviation
I am confident I get the success I deserve in life	321	3.41	1.072
Sometimes I feel depressed	321	2.83	1.242
When I try, I generally succeed	321	4.012	.7245
Sometimes when I fail, I feel worthless	321	2.928	1.2715
I complete tasks successfully	321	4.028	.7999
Sometimes, I do not feel in control of my work	321	2.847	1.0451
, I am satisfied with myself	321	3.710	1.0339
I am filled with doubts about my competence	321	3.632	1.0963
I determine what will happen in my life	321	3.629	1.0795
I do not feel in control of my success in my career	321	3.393	1.1944
I am capable of coping with most of my problems	321	3.776	.9149
There are times when things look pretty bleak and hopeless to me	321	3.016	1.1765
Total		3.43	1.05

The scale items mean values ranged from 2.83 to 4.028 whilst the standard deviation ranged from .7245 to 1.2715. The respondents showed to agree the strongest on generally succeeding when they try and complete tasks successfully. So, the mean and standard deviation values 3.43 and 1.05 imply that respondents were mostly neutral in their responses in the construct of core self-evaluations.

4.2.3   Distributive Justice

The descriptive statistics of the mean and standard deviation of distributive justice is outlined in table 4.2-3

Table 4.2-3: Distributive Justice

Distributive Justice			
	N	Mean	Std. Deviation
My work schedule is fair	321	4.891	1.8567
I think that my level of pay is fair	321	3.776	2.0720
I consider my workload to be quite fair	321	4.131	2.0035
, the rewards I receive here is quite fair	321	3.931	1.9417
I feel that my job responsibilities are fair	321	4.474	1.9268
Total		4.24	1.96

The mean and standard deviations for distributive justice were 4.24 and 1.96 respectively which indicates that respondents agreed with the statements provided concerning distributive justice.

4.2.4 Innovative work behaviour

The descriptive statistics of the mean and standard deviation of innovative work behaviour are outlined in table 4.2-4.

Table 4.2-4: Innovative work behaviour

Innovative work behaviour	N	Mean	Std. Deviation
I create new ideas for difficult issues	321	4.894	1.4983
I make important organisational members enthusiastic for innovative ideas	321	4.564	1.4393
I mobilise support for innovative ideas	321	4.592	1.4356
I transform innovative ideas into useful applications	321	4.607	1.4346
I search out new working methods, techniques, or instruments	321	4.779	1.4951
I introduce innovative ideas into the work environment in a systematic way	321	4.589	1.5550
I evaluate the utility of innovative ideas	321	4.654	1.4193
I acquire approval for innovative ideas	321	4.489	1.5514
I generate original solutions for problems	321	4.804	1.3632
Total		4.66	1.46

The mean and standard deviations for innovative work behaviour were 4.66 and 1.46 respectively which indicates that respondents agreed with the statements provided concerning innovative work behaviour.

4.2.5 Job Complexity

The descriptive statistics of the mean and standard deviation of job complexity is outlined in table 4.2-5.

Table 4.2-5: Job Complexity

Job Complexity			
	N	Mean	Std. Deviation
The job requires that I only do one task or activity at a time	321	3.757	1.2003
The tasks on the job are simple and uncomplicated	321	3.32	1.301
The job comprises relatively uncomplicated tasks	321	3.372	1.2225
The job involves performing relatively simple tasks	321	3.34	1.278
Total		3.45	1.25

The mean and standard deviations for job complexity were 3.45 and 1.25 respectively which indicates that respondents were mostly neutral about the statements provided concerning job complexity.

4.2.6 Job Satisfaction

The descriptive statistics of the mean and standard deviation of job satisfaction is outlined in table 4.2-6.

Table 4.2-6: Job Satisfaction

Job Satisfaction			
	N	Mean	Std. Deviation
Being able to keep busy all the time.	321	3.65	1.062
The chance to work alone on the job.	321	3.785	1.0341
The chance to do different things from time to time.	321	3.71	1.207
The chance to be "somebody" in the community.	321	3.498	1.1703
The way my boss handles his/her workers.	321	3.346	1.3165
The competence of my supervisor in making decisions.	321	3.421	1.2276
Being able to do things that do not go against my principles.	321	3.832	1.1304

Job Satisfaction			
The way my job provides for steady employment	321	3.745	1.0474
The chance to do things for other people.	321	3.829	.9899
The chance to tell individuals what to do.	321	3.358	.9216
The chance to do something that makes use of my abilities.	321	3.760	1.1243
The way company policies are put into practice.	321	3.131	1.2100
My pay and the amount of work I do	321	2.991	1.2183
The chances for advancement on this job.	321	2.981	1.1988
The freedom to use my own judgement.	321	3.607	1.1132
The chance to try my own methods of doing the job	321	3.573	1.0905
The working conditions	321	3.629	1.0996
The way my co-workers get along with each other	321	3.520	1.1126
The praise I get for doing a good job	321	3.364	1.2124
The feeling of accomplishment I get from the job	321	3.604	1.1921
Total		3.52	1.13

The mean and standard deviations for job satisfaction were 3.52 and 1.13 respectively which indicates that respondents were mostly neutral about the statements provided concerning job satisfaction.

4.2.7 Perceived Supervisor Support

The descriptive statistics of the mean and standard deviation of perceived supervisor support is outlined in table 4.2-7.

Table 4.2-7: Perceived Supervisor Support

Perceived Supervisor Support			
	N	Mean	Std. Deviation
I take ideas to my boss because he or she deals with them effectively	321	4.212	1.9474
My supervisor is open and fair when I submit an idea	321	4.645	1.8145
My supervisor listens carefully to what I say when I bring in an idea	321	4.632	1.8274
My supervisor is willing to support me when I have a valuable idea	321	4.729	1.7901
My supervisor handles my ideas promptly	321	4.290	1.8046
My supervisor takes action in pursuance of my ideas we discussed	321	4.312	1.7579
My supervisor provides high priority to handling my ideas	321	4.081	1.7499
Total		4.41	1.81

The mean and standard deviations for perceived supervisor support were 4.41 and 1.81 respectively which indicates that respondents agreed with the statements provided concerning perceived supervisor support.

4.2.8 Turnover Intentions

The descriptive statistics of the mean and standard deviation of turnover intentions is outlined in table 4.2-8.

Table 4.2-8: Turnover Intentions

Turnover Intentions			
	N	Mean	Std. Deviation
How often have you considered leaving your current job?	321	4.302	1.9714
How frequently do you scan newspapers and other platforms for job opportunities?	321	3.829	2.1240
To what extent is your current job not addressing your important personal needs?	321	4.318	1.7603
How often are opportunities to achieve your most important goals at work jeopardised?	321	3.745	1.7185
How often are your most important personal values at work compromised?	321	3.252	1.7505

Turnover Intentions			
How frequently are you day- dreaming about a different job that will suit your personal needs?	321	4.523	2.0571
What is the probability that you will leave your job, if you get another suitable offer?	321	5.427	1.8862
How frequently do you look forward to another day at work?	321	4.283	1.6930
How often do you think about starting your own business?	321	5.069	1.8912
How often do family responsibilities prevent you from quitting?	321	4.676	2.2723
How often do only vested personal interest (pension fund, unemployment fund, etc.) prevent you from quitting?	321	3.829	2.1648
How frequently are you emotionally agitated when arriving home after work?	321	3.882	1.7135
How often is your current job affecting on your personal well-being?	321	3.972	1.8258
How often do the troubles associated with relocating, prevent you from quitting?	321	3.368	2.1070
Total		4.18	1.92

The mean and standard deviations for turnover intentions were 4.18 and 1.92 respectively which indicates that respondents agreed with the statements provided concerning turnover intentions.

4.3   DATA SCREENING

4.3.1   Missing Data in Rows

Following the data importation into SPSS, the data was inspected for missing observations. To facilitate this process, the data was moved to MS Excel where the data was examined in more detail to determine the missing cases (Gaskin,2016). In total 338 questionnaires were collected. Twelve questionnaires were incomplete and were not considered for analysis, bringing the sample to a total of 326 respondents. For this study, the size of the sample was large enough. Nevertheless, there were still some questions that respondents left unanswered. Table 4.3-1 indicates the missing values and the procedure accomplished for the cases.

According to Dong and Peng (2013), there is no official cut-off point in literature concerning what is considered to be an acceptable percentage of missing data for statistical interpretations to still be considered valid. The chances of bias within the statistical analysis is greater when the missing data exceeds 10% of the subjects (Bennett, 2001; Eekhout *et al.*, 2014). For this study, missing values with a percentage greater than 10% (over 30 missing) were cut off.

Table 4.3-1: Missing Values

Case Numbers	Total Missing Values	Percentage of Sample	Procedure
83	36	>10%	Removed from dataset
67	31	>10%	Removed from dataset
80 Cases	<23	<10%	Mean (continuous) and Median imputed (ordinal)

A total of 80 items from the questionnaire had data missing, making up less than 10% of the total sample. The median was imputed for the ordinal Likert scale variables. For the variables that were continuous and missing data, the mean was imputed. Furthermore, two cases were deleted attributable to missing data above the cut-off point.

In order to determine if there was any missing data in the columns, tests for frequency was conducted in SPSS where it was confirmed that there were no missing variables in the data indicating that no further action was required (Gaskin,2016).

Furthermore, the data was inspected to determine if there were any significant outliers in the continuous variables. No significant outliers were established for age and the years in the company and profession.

4.3.2   Unengaged Responses

To determine if respondents were unengaged during the completion of the questionnaire, the standard deviations needed to be calculated (Gaskin,2016). This was accomplished to establish if respondents were focussed during the completion of the survey. The researcher proceeded to conduct a standard deviation analysis to determine if there was any variance in the responses

of the respondents (Gaskin,2016). This process was undertaken in MS Excel attributable to the ease of inspecting the values once the standard deviations were calculated. According to Gaskin (2016), items with a standard deviation of less than 0.5 are to be removed from the data. In the dataset, the lowest standard deviation was 0.92 and the highest 2.76. No cases were established to have zero variance and indicated that the respondents of the study were engaged when responding the questions.

4.3.3 Skewness and Kurtosis in Data

With the use of SPSS, the skewness and kurtosis tests were performed, and the output was exported to MS Excel to facilitate the examination that the variables' skewness were within the acceptable limits of ± 2 and did not depart from normality in extreme ways (Field, 2000; Gaskin, 2016).

Table 4.3-2: Assessment of Normality

Variable	min	max	skew	c.r.	kurtosis	c.r.
CSE12	1,000	5,000	,085	,623	-,906	-3,314
JS1	1,000	5,000	-,596	-4,356	-,184	-,673
TI2	1,000	7,000	,152	1,115	-1,304	-4,769
PSS7	1,000	7,000	-,117	-,856	-,834	-3,049
PSS1	1,000	7,000	-,236	-1,724	-1,119	-4,091
PSS2	1,000	7,000	-,448	-3,277	-,848	-3,101
PSS3	1,000	7,000	-,568	-4,155	-,753	-2,752
PSS4	1,000	7,000	-,604	-4,417	-,642	-2,349
PSS5	1,000	7,000	-,220	-1,607	-,974	-3,564
PSS6	1,000	7,000	-,266	-1,946	-,854	-3,124
JS3	1,000	5,000	-,670	-4,899	-,535	-1,956
JS4	1,000	5,000	-,377	-2,758	-,630	-2,305
JS11	1,000	5,000	-,681	-4,984	-,298	-1,091
JS14	1,000	5,000	-,138	-1,013	-,855	-3,127
JS20	1,000	5,000	-,620	-4,532	-,437	-1,598
TI1	1,000	7,000	-,089	-,649	-1,097	-4,014
TI4	1,000	7,000	,203	1,487	-,772	-2,823
TI6	1,000	7,000	-,298	-2,178	-1,220	-4,463
TI13	1,000	7,000	,029	,213	-,979	-3,581
IWB1	1,000	7,000	-,813	-5,944	,533	1,948
IWB3	1,000	7,000	-,626	-4,578	,261	,955
IWB4	1,000	7,000	-,576	-4,212	,256	,936
IWB5	1,000	7,000	-,580	-4,240	-,149	-,544
IWB6	1,000	7,000	-,366	-2,674	-,384	-1,403
IWB7	1,000	7,000	-,498	-3,643	,231	,845
IWB9	1,000	7,000	-,599	-4,378	,599	2,192
DF1	1,000	7,000	-,612	-4,477	-,629	-2,299
DF2	1,000	7,000	,120	,875	-1,280	-4,682
DF3	1,000	7,000	-,005	-,037	-1,174	-4,294
DF5	1,000	7,000	-,317	-2,316	-,965	-3,529
JC2	1,000	5,000	-,331	-2,418	-1,019	-3,726
JC3	1,000	5,000	-,319	-2,334	-,878	-3,213
JC4	1,000	5,000	-,363	-2,655	-,935	-3,419

Variable	min	max	skew	c.r.	kurtosis	c.r.
CSE2	1,000	5,000	,249	1,820	-,986	-3,607
CSE4	1,000	6,000	,180	1,318	-,960	-3,511
Multivariate					275,414	48,480

Consequently, none of the values were identified to be less than -2 and greater than 2 for both skewness and kurtosis, indicating that there were no concerns concerning skewness and kurtosis in the dataset.

4.4 CORRELATION MATRIX

Table 4.4-1: Correlation Matrix

Correlations							
	CSE	DJ	JC	IWB	JS	PSS	TI
CSE	1	.405**	.097	.140*	.470**	.269**	-.411**
DJ	.405**	1	-.012	.180**	.472**	.404**	-.444**
JC	.097	-.012	1	.146**	.275**	.248**	-.189**
IWB	.140*	.180**	.146**	1	.279**	.295**	-.035
JS	.470**	.472**	.275**	.279**	1	.626**	-.539**
PSS	.269**	.404**	.248**	.295**	.626**	1	-.452**
TI	-.411**	-.444**	-.189**	-.035	-.539**	-.452**	1
**. Correlation is significant at the 0.01 level (2-tailed).							
*. Correlation is significant at the 0.05 level (2-tailed).							

According to Akoglu (2018), correlations are depicted by numbers that range from -1 to 1 where the number one is considered to be a perfect correlation. In the cases where the correlation is negative, it is an indication that the variables in question are inversely related.

The closer the correlation is to 1 the stronger it is considered to be. Dancey and Reidy (2007) support this statement as they have introduced thresholds that measure the strength of a correlation. According to the authors, if a correlation is within the range of 0.1 to 0.3 it is considered weak, a correlation ranging from 0.4 to 0.6 is considered moderate and a strong relationship occurs when a correlation is 0.7 and above.

With the use of the Pearson's product-moment correlation, the scales for the various variables are tested for independence. A moderate negative correlation was established between job satisfaction and turnover intentions (r= -.539, p <0.01). Another moderate positive correlation was established between perceived supervisor support and job satisfaction (r=.626, p <0.01). Furthermore, core-self-evaluations indicated to have a moderate relationship with distributive justice (r=.405, p<0.01), core-self-evaluations also indicated to have a moderate relationship with job satisfaction (r=.470, p<0.01) and a negative moderate relationship with turnover intentions (r= -.411, p<0.01). In addition, distributive justice indicated to have a moderate relationship with job satisfaction (r=.472, p<0.01), perceived supervisor support (r=.404, p<0.01) and with turnover intentions (r=-.444, p<0.01). In addition, perceived supervisor support indicated to have a negative moderate correlation with turnover intentions (r=-.452, p<0.01).

4.5   EXPLORATORY FACTOR ANALYSIS

With the use of SPSS (version 25), an Exploratory Factor Analysis (EFA) was conducted to determine the sample adequacy and concerns pertaining to validity and reliability. Furthermore, Gaskin (2016) places importance on the use of EFA to derive the pattern matrix required for the CFA. This study made use of the Maximum Likelihood method and the ProMax rotation method.

4.5.1   Sample Adequacy Determination

Table 4.5-1: KMO and Bartlett's Measure of Sample Adequacy

KMO and Bartlett's Test		
Kaiser-Meyer-Olkin Measure of Sampling Adequacy.		.909
Bartlett's Test of Sphericity	Approx. Chi-Square	9927.537
	df	903
	Sig.	.000

Table 4.5-1 depicts a good outcome for KMO and Bartlett's tests of 0.91 which is significant (0.000). The sample size is deemed adequate to conduct SEM (Gaskin, 2016). The communalities shown in Table 5 are considered as vital in determining whether a sample is adequate as they represent the amount of each variable described by each factor. It is

recommended that none of the communalities should be below the value of 0.30 as the higher the communality, the greater the representation of the values in the common factor space (Gaskin, 2016; Taherdoost, Sahibuddin & Jalaliyoon, 2014). Table 4.5-2 indicates that none of the communalities fall under the threshold of 0.30.

Table 4.5-2: Communalities for Determination of Sample Adequacy

Communalities		
	Initial	Extraction
CSE2	.492	.473
CSE4	.337	.345
CSE12	.427	.358
DJ1	.478	.443
DJ2	.633	.587
DJ3	.711	.756
DJ4	.695	.658
DJ5	.734	.786
IWB1	.576	.539
IWB3	.611	.524
IWB4	.706	.687
IWB5	.632	.604
IWB6	.777	.760
IWB7	.745	.720
IWB8	.437	.347
IWB9	.620	.586
JC2	.752	.824
JC3	.738	.786
JC4	.739	.778
JS1	.457	.413
JS3	.607	.619
JS4	.472	.483

Communalities		
JS10	.396	.305
JS11	.595	.634
JS12	.430	.376
JS14	.557	.547
JS19	.583	.517
JS20	.598	.574
PSS1	.658	.611
PSS2	.857	.863
PSS3	.873	.893
PSS4	.886	.898
PSS5	.896	.908
PSS6	.898	.919
PSS7	.835	.851
TI1	.573	.526
TI2	.517	.456
TI4	.623	.653
TI5	.494	.388
TI6	.594	.556
TI12	.624	.661
TI13	.683	.712
TI14	.391	.343
Extraction Method: Maximum Likelihood		

Sample adequacy is established in Table 4.5-3 which presents the total variance explained where variance explained was 60.69% after several iterations to determine the pattern matrix in Table 4.6-3, page 94 (Gaskin, 2016).

Table 4.5-3: Total Variance Explained

Factor	Initial Eigenvalues			Extraction Sums of Squared Loadings			Rotation Sums of Squared Loadings
	Total	% of Variance	Cumulative %	Total	% of Variance	Cumulative %	Total
1	12.280	28.559	28.559	10.971	25.513	25.513	9.229
2	4.847	11.273	39.832	3.841	8.932	34.445	5.738
3	3.388	7.880	47.712	3.597	8.366	42.811	8.238
4	2.693	6.263	53.975	3.253	7.565	50.376	7.906
5	2.024	4.708	58.684	1.618	3.762	54.138	6.666
6	1.702	3.958	62.641	1.568	3.647	57.785	3.487
7	1.571	3.654	66.295	.690	1.606	59.391	1.796
8	1.004	2.335	68.630	.728	1.693	61.084	1.689
9	.920	2.141	70.771				
Extraction Method: Maximum Likelihood.							
a. When factors are correlated, sums of squared loadings cannot be added to obtain a total variance.							

4.6 RELIABILITY AND DIMENSIONALITY DETERMINATION

The entire sets of variables reported a Cronbach alpha above 0.70 (Table 4.6-1). There is an indication that the variables are internally consistent.

Table 4.6-1: Reliability Test - Cronbach Alpha

Variable	Cronbach's Alpha
Turnover Intention	0.87
Innovative Work Behaviour	0.91
Job Satisfaction	0.88
Perceived Supervisor Support	0.97
Core self-evaluation	0.67
Distributive Justice	0.89
Job Type	0.92

Following the EFA, the goodness-of-fit test established that it is significant which is attributable to a sample size that is large (Gaskin, 2016).

Table 4.6-2: Goodness-of-fit Test

Goodness-of-fit Test		
Chi-Square	df	Sig.
986.650	587	.000

4.6.1 Convergent Validity

According to Padenga (2016), a pattern matrix is crucial to connect the factor analysis conducted in SPSS and the confirmatory factor analysis. Gaskin (2016) explains that convergent validity is tested by examining whether the various items of a scale load in their factor in the pattern matrix.

Table 4.6-3: Pattern Matrix

Pattern Matrix[a]								
	Factor							
	1	2	3	4	5	6	7	8
CSE2							.588	
CSE4							.593	
CSE12							.479	
DJ1					.573			
DJ2					.753			
DJ3					.939			
DJ4					.728			
DJ5					.900			
IWB1		.738						
IWB3		.692						
IWB4		.775						

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Pattern Matrix[a]							
IWB5		.801					
IWB6		.857					
IWB7		.818					
IWB8		.531					
IWB9		.785					
JC2					.934		
JC3					.885		
JC4					.867		
JS1			.597				
JS3			.822				
JS4			.780				
JS10			.503				
JS11			.846				
JS12			.461				
JS14			.549				
JS19			.406				
JS20			.679				
PSS1	.715						
PSS2	.894						
PSS3	.913						
PSS4	.929						
PSS5	.956						
PSS6	.903						
PSS7	.880						
TI1				.624			
TI2				.577			
TI4				.756			
TI5				.649			
TI6				.606			

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Pattern Matrix[a]								
TI12				.798				
TI13				.771				
TI14				.655				
Extraction Method: Maximum Likelihood. Rotation Method: Promax with Kaiser Normalization.								
a. Rotation converged in 7 iterations.								

4.6.2 Discriminant Validity

The examination of whether there are cross loadings between factors is to test the discriminant validity (Padenga, 2016). There are no major cross loadings in the pattern matrix; therefore, it is an indication that discriminant validity is met in this study. After the examination of the correlation matrix indicates that there are no major correlation and no correlations greater than 0.70 (Gaskin, 2016).

Table 4.6-4: Factor Correlation Matrix

Factor Correlation Matrix								
Factor	1	2	3	4	5	6	7	8
1	1.000	.291	.537	-.490	.429	.213	.044	.189
2	.291	1.000	.315	-.075	.176	.127	.022	.046
3	.537	.315	1.000	-.507	.404	.341	.029	.230
4	-.490	-.075	-.507	1.000	-.569	-.138	-.255	-.243
5	.429	.176	.404	-.569	1.000	-.047	.189	.223
6	.213	.127	.341	-.138	-.047	1.000	-.076	.194
7	.044	.022	.029	-.255	.189	-.076	1.000	-.063
8	.189	.046	.230	-.243	.223	.194	-.063	1.000
Extraction Method: Maximum Likelihood. Rotation Method: Promax with Kaiser Normalization.								

4.7 CONFIRMATORY FACTOR ANALYSIS
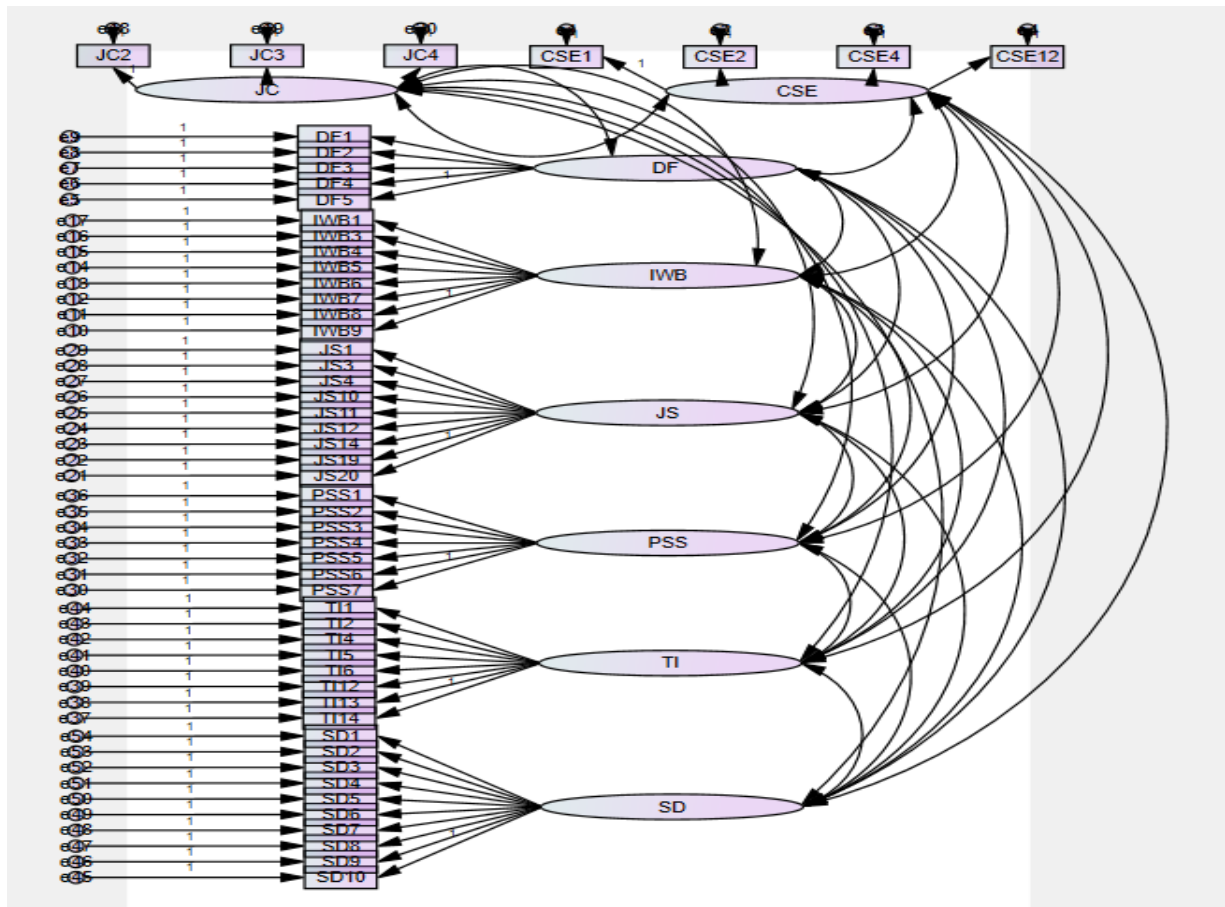
Figure 4.1: Measurement Model based on Pattern Matrix

To conduct the confirmatory factor analysis, SPSS Amos version 25 was utilised. Figure 4.1 presents the initial model built based on what was extracted from the exploratory factor analysis.

4.7.1 Model Fit Measures
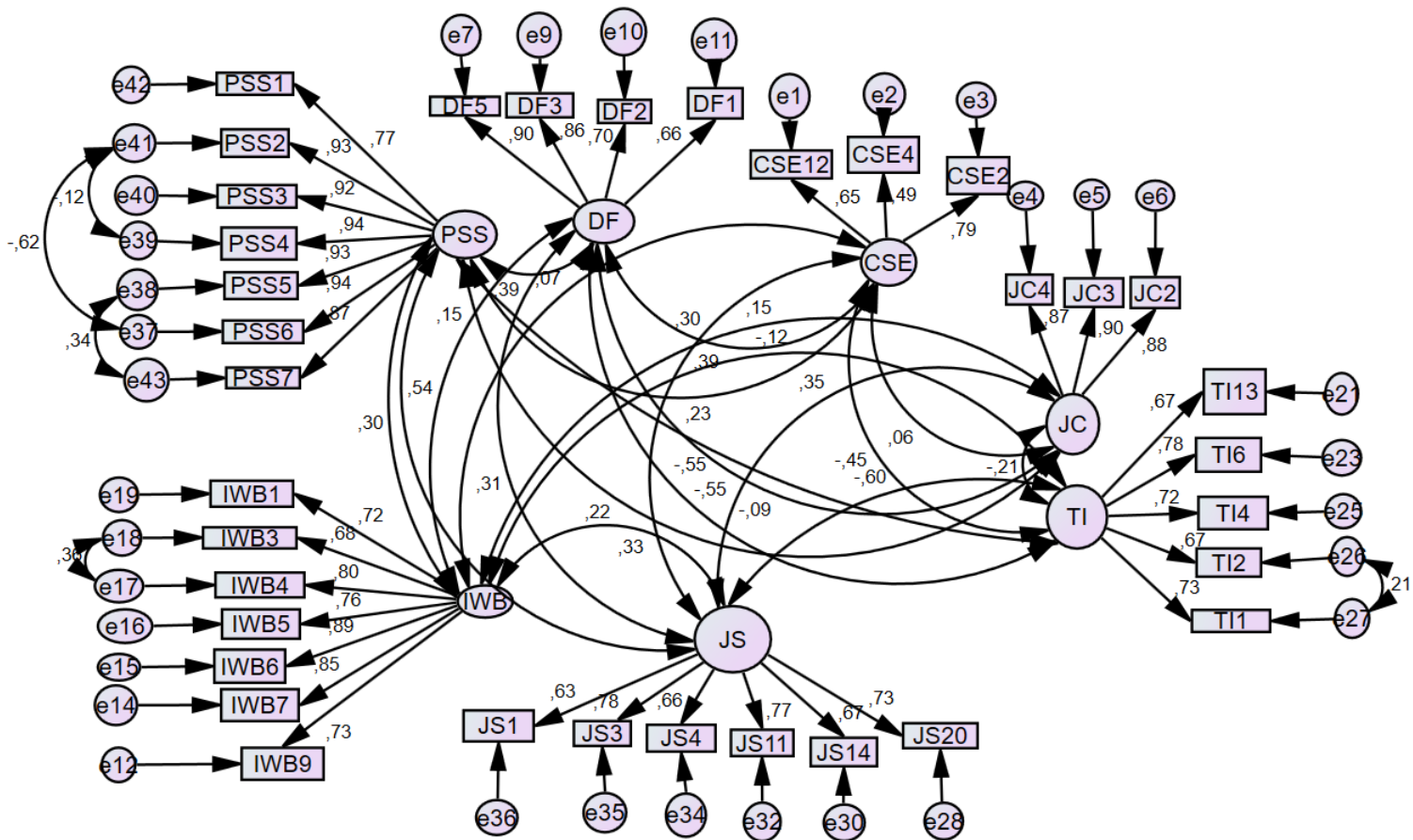
Figure 4.2: Final Adjusted CFA Diagram

Table 4.7-1 indicates the output of the model fit measures obtained from the final CFA diagram. As displayed in the diagram, few items were removed from each construct attributable to concerns concerning validity that were encountered.

Table 4.7-1: Final Model Fit Measures

Model Fit Indices	Recommended Guidelines	Values Obtained
RMSEA	<0.08	0,053
CMIN/d.f	Maximum Limit of 5	1,908
NFI	NFI ≥ 0.95	0,881
TLI	NNFI ≥ 0.95	0.932

Model Fit Indices	Recommended Guidelines	Values Obtained
CFI	CFI≥.90	0.939
GFI	GFI≥ 0.95	0,845
AGFI	AGFI ≥0.90	0.817

Sources: Hooper, Coughlan & Mullen (2008); Kline (2015); Wheaton, Muthen, Alwin & Summers (1977).

Based on the values recommended by various authors. The model fit measure values obtained in the study were established to moderately meet the acceptable thresholds.

Table 4.7-2: Final Model Validity

Construct	Item	Loading	Cronbach Alpha	Composite Reliability	Average Variance Extracted
Innovative work behaviour	IWB9	,730	0.917	0,914	0,605
	IWB7	,850			
	IWB6	,885			
	IWB5	,756			
	IWB4	,801			
	IWB3	,683			
	IWB1	,717			
Perceived Supervisor Support	PSS6	,940	0.966	0,968	0,814
	PSS5	,930			
	PSS4	,937			
	PSS3	,921			
	PSS2	,930			
	PSS1	,774			
	PSS7	,873			

Construct	Item	Loading	Cronbach Alpha	Composite Reliability	Average Variance Extracted
Turnover Intentions	TI6	,777	0.843	0,840	0,513
	TI13	,671			
	TI2	,668			
	TI4	,724			
	TI1	,735			
Core-self-evaluations	CSE12	,646	0.678	0,687	0,431
	CSE4	,493			
	CSE2	,795			
Job Satisfaction	JS11	,774	0.857	0,859	0,505
	JS4	,656			
	JS3	,784			
	JS1	,631			
	JS14	,670			
	JS20	,734			
Job Complexity	JC3	,901	0.915	0,916	0,783
	JC2	,880			
	JC4	,874			
Distributive Justice	DJ2	,697	0.856	0,864	0,617
	DJ1	,657			
	DJ3	,860			
	DJ5	,901			

Convergent Validity was established as all variables have an AVE of at least 0.5. Reliability was also established as a majority of the variables had a CR of above 0.7. However, CSE showed concerns concerning reliability as the CR value was 0.666 but it did not deviate from 0.7 excessively. According to Fornell and Larcker (1981), if the average variance extracted for a construct is below the value of 0.5 but presents a composite reliability above 0.6 convergent validity can be deemed adequate. Concerning core-self-evaluations convergent validity is still adequate as the table indicates a composite reliability (CR) of 0.687 and an AVE of 0.431.

4.7.2   Data Imputation

As common method bias was not established in the dataset, the composite scores from the confirmatory factor analysis were imputed giving a single score to each construct.

4.8   MODELLING

4.8.1   Multivariate Assumptions

4.8.1.1 Outliers and Influential

Cooks Distance

The bigger the number, the bigger the influence the response has on the regression of the variables. Literature indicates that if the distance is greater than 1, it can be an influential record and can be removed. In this case, the Cooks distance is below 1 and can be regarded to not be influential on the regression of the variables (See Appendix E).

Multicollinearity

Variable inflation factor values should ideally be less than 3 and for tolerance the values should be greater than 0.1. therefore, there is no overlap in the portion of variance explained in the dependent variable. To assess multicollinearity, this study made use of variance inflation factors and tolerance. According to Hair, Black, Babin and Anderson (2010), if the reported value for VIF surpasses 4.0 or the tolerance is below 0.2 there is an indication of a problem with multicollinearity. Also, the authors further state that the cut-off level for VIF is 10. Therefore, these thresholds were utilised in interpreting the VIF and tolerance for this study.

Table 4.8-1: Multicollinearity

Coefficients							
Model		Unstandardised Coefficients		Standardised Coefficients	t	Sig.	Collinearity Statistics	
		B	Std. Error	Beta			Tolerance	VIF
1	(Constant)	.267	.042		6.369	.000		
	IWB	.001	.005	.007	.162	.871	.825	1.212
	PSS	.005	.004	.051	1.241	.215	.881	1.136
	JS	.032	.011	.119	2.814	.005	.822	1.217
	JC	.039	.005	.313	7.450	.000	.839	1.193
	DF	-.021	.004	-.224	-5.136	.000	.777	1.288
	CSE	-.117	.010	-.458	-11.251	.000	.893	1.120
a. Dependent Variable: TI								

Model Structural Model Fit
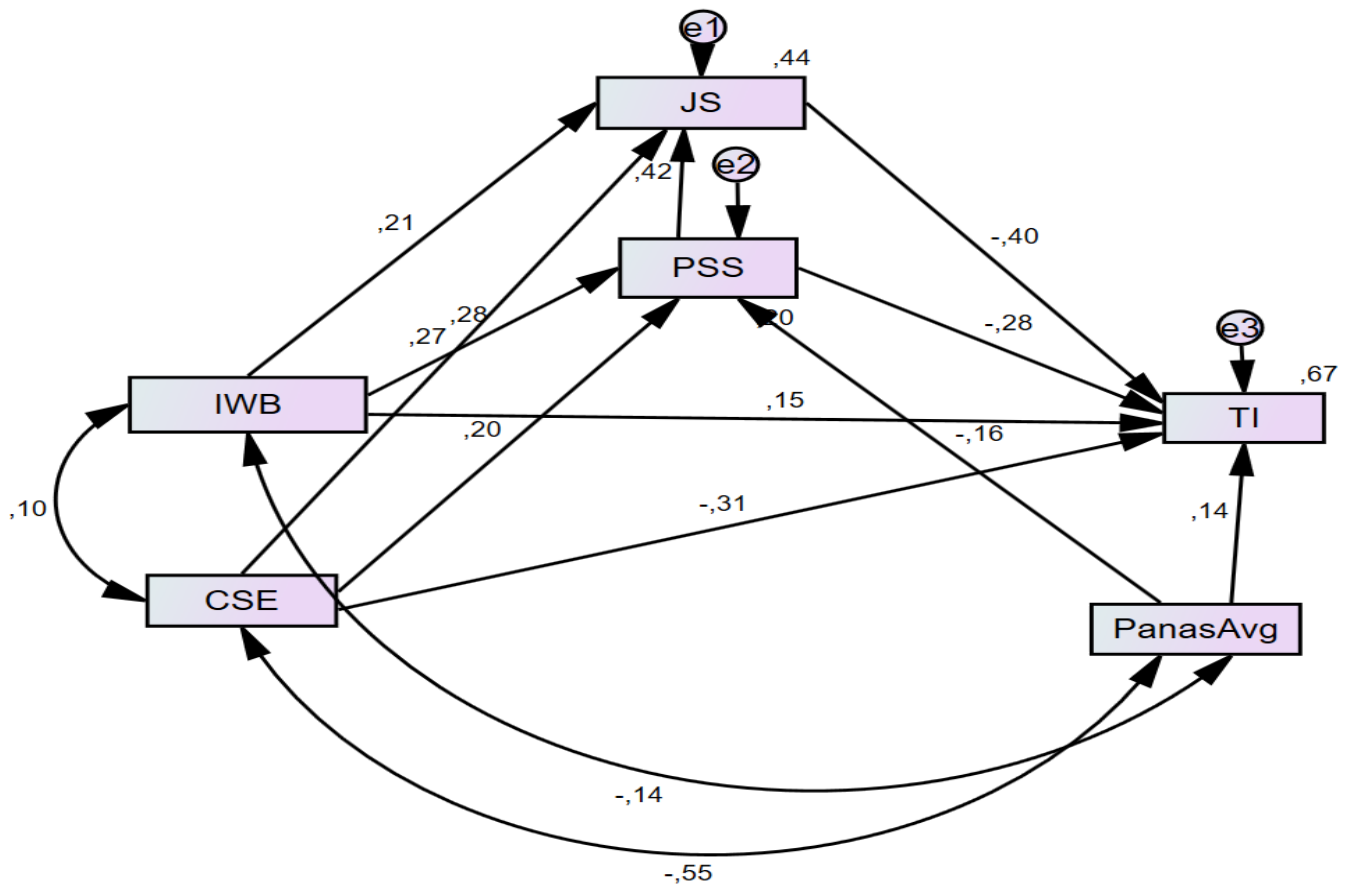
Figure 4.3: Adjusted Model for Model fit

Adjusted model to gain model fit estimated a relationship from perceived supervisor support and job satisfaction and from core-self-evaluations to job satisfaction.

Table 4.8-2: Model Fit Measures of Model

Model Fit Indices	Recommended Guidelines	Values Obtained
RMSEA	<0.08	0,075
CMIN/d.f	Maximum Limit of 5	2,797
NFI	NFI ≥ 0.95	0.996
TLI	NNFI ≥ 0.95	0,963
CFI	CFI≥.90	0,998
GFI	GFI≥ 0.95	0,997
AGFI	AGFI ≥0.90	0,939

4.9   HYPOTHESIS TESTING

4.9.1   Direct Relationship Analysis

Table 4.9-1: Standardised Regression Path Significance

		Structural Paths	Final Model	
			Estimate	P
PSS	<---	PanasAvg	-,156	,009
PSS	<---	CSE	,199	***
PSS	<---	IWB	,284	***
JS	<---	IWB	,212	***
JS	<---	CSE	,267	***
JS	<---	PSS	,423	***
TI (H4)	<---	CSE	-,308	***

TI	<---	PSS	-,278	***
TI	<---	PanasAvg	,140	***
TI (H1)	<---	IWB	,152	***
TI	<---	JS	-,395	***

Hypothesis 1: There is a significant association between innovativeness and turnover intentions amongst continuous learners.

Standardised Regression Weight =.153, Effect Size: Small, P-value = less than 0.01

Table 4.9-2: Effect Size Criteria

0	0,02	0,15	0,35
None	Small	Medium	Large

Table 4.9-3: Effect Size of Innovative work behaviour

	Included	Excluded	f-squared	Effect size
R-squared	0,67	0,65	0,0606	Small

The SEM results above reveal that innovative work behaviour has a significant effect on turnover intentions of employees. Innovative work behaviour construct was established to be a significant determinant of turnover intentions with a p-value of less than 0.01. Hence, Hypothesis 1 is supported by findings.

4.9.2 Mediation

There are various approaches in testing for mediation such as the Baron and Kennedy (1986), product of coefficients and bootstrap procedure for testing specific indirect effects (Perera,2013). According to Preacher and Hayes (2008), approaches such as of Baron and Kennedy have minimal usefulness in studies that examine multiple mediators.

Currently, AMOS solely calculates the total indirect effects. This study made use of a plugin created by Gaskin that produced specific indirect effects to test for mediation of each path. According to Mallinckrodt, Abraham, Wei and Russell (2006) the lack of provision for specific indirect effects on programmes such as AMOS can become an issue to researcher interested in exploring specific intervening paths in a theoretical model. For this study, bootstrapping of specific indirect effects was run, to identify unique indirect effects for every mediation possible. As recommended by Gaskin and Lim (2018), this study made use of the AMOS plugin which made use of the Hayes method of bootstrapping to estimate indirect effects. According to Preacher and Hayes (2008) when testing the significance of indirect effects, a bootstrapping test is more robust in comparison to the Sobel's z test.

Table 4.9-4: Estimate Indirect effects Output

Indirect Path	Unstandardised Estimate	Lower	Upper	P-Value	Standardised Estimate
IWB --> PSS --> JS	0,111	0,074	0,153	0,001	0,126***
IWB --> PSS --> TI	**-0,102**	**-0,147**	**-0,065**	**0,001**	**-0,083***
IWB --> JS --> TI	**-0,103**	**-0,153**	**-0,063**	**0,001**	**-0,084***
CSE --> PSS --> JS	0,147	0,095	0,209	0,001	0,120**
CSE --> PSS --> TI	-0,135	-0,199	-0,089	0,001	-0,079***
CSE --> JS --> TI	-0,182	-0,265	-0,121	0,000	-0,106***
PSS --> JS --> TI	-0,115	-0,148	-0,088	0,001	-0,168***

H2: Perceived Supervisor Support mediates the relationship between individuals' innovation and turnover intentions amongst continuous learners.

Based on the output above, perceived supervisor support was established to mediate the relationship between innovative work behaviour and turnover intention as the p-value was significant, Therefore, Hypothesis 2 was supported.

H3: Job Satisfaction mediates the relationship between innovativeness of an individual' and turnover intentions amongst continuous learners.

Job satisfaction mediates the effect of IWB to TI at p =.001. Hypothesis 3 is supported, and it can be established that job satisfaction mediates the relationship between innovative work behaviour and turnover intentions.

H4: There is a significant association between core-self-evaluations and turnover intentions amongst learners.

Table 4.9-5: Effect Size of Core-Self - evaluations

	Included	Excluded	f-squared	Effect size
R-squared	0,67	0,6	0,2121	Medium

Based on the effect size criterion, there is a medium effect size in the above table. Hypothesis 4 is supported with a significant p-value with a regression weight of -.530. The regression weight represents the variables direct effect on the endogenous variable. As a result, it can be established that one full standard deviation increase in CSE would decrease turnover intentions by.557, whilst holding all other variables constant.

4.9.3 Moderation

In order to test for moderation, an interaction effect was added to the model to assess whether the interaction effect was indeed significant. Firstly, the variables were standardised followed by the creation of product terms which was the hypothesised moderator multiplied by the independent variable which is innovative work behaviour. SPSS software was utilised for standardising the variables and the creation of the product terms prior to using AMOS for analysis.

H5: Perceived distributive justice moderates the relationship between individuals' innovation and turnover intentions amongst continuous learners.

Table 4.9-6: Standard Regression Path Significance for Distributive Justice as Moderator

Structural Paths				
			Estimate	P
TI	<---	ZDF	-,273	***
TI	**<---**	**IWBXDF**	**-,022**	**,470**

The value for P in for the product term of innovative work behaviour and distributive justice is greater than 0.05 at a value of p=0,470 in the table above. Distributive justice as a moderator does not have a significant effect on the innovative work behaviour and turnover intentions relationship. Hence, hypothesis 5 is not supported therefore the null hypothesis is not rejected.

H6: Core-self-evaluations moderate the relationship between individuals' innovation and turnover intentions amongst continuous learners.

Table 4.9-7: Standard Regression Path Significance for Core-self-evaluations as Moderator

Structural Paths			Estimate	P
TI	<---	CSE	-,311	***
TI	<---	IWBXcse	,007	,832

The p-value for the interaction term of innovative work behaviour and core-self-evaluations was greater than 0.05 at a p-value = 0.832. It can be concluded that core-self-evaluations do not moderate the relationship between innovative work behaviour and turnover intentions of employees. Hypothesis 6 is not supported therefore; the null hypothesis is not rejected.

H7: Age moderates the relationship between individuals' innovation and turnover intentions amongst continuous learners.

Table 4.9-8: Standard Regression Path Significance for age as Moderator

Structural Paths			Estimate	P
TI	<---	IWBXAge	-,053	,095
TI	<---	ZAge	,085	,009

At a 5% significance level, age was not established to moderate the relationship between innovative work behaviour and turnover intentions as the p-value was greater than 0.05. At a 10% significance level, age is established to be a significant moderator of the

establishedrelationship with a p-value of 0,095. The figure above depicts that when innovative work behaviour is low, older individuals have greater turnover intention levels.

Hypothesis 7 is not supported at the established significance level for this study.

Figure 4.4: Age as a moderator on direct relationship

Figure 4.4 depicts the dynamics of the innovative work behaviour and turnover intentions relationship when exposed to different levels of age. Although age was not a significant moderator in the direct relationship at a 5% significance level, Figure 4.4 indicates that when innovative work behaviour is low individuals with higher age have a greater propensity to leave.

H8: Gender moderates the relationship between individuals' innovation and turnover intentions amongst continuous learners.

Table 4.9-9: Standard Regression Path Significance for Gender as Moderator

Structural Paths				
			Estimate	**P**
TI	<---	**IWBXGen**	,060	,061
TI	<---	ZGender	-,056	,082

At a 5% significance level, gender was not established to moderate the relationship between innovative work behaviour and turnover intentions as the p-value was greater than 0.05. At a

10% significance level, gender is established to be a significant moderator of the established relationship with a p-value of 0.061. The figure above depicts that when innovative work behaviour is low, men have a greater propensity to leave the organisation compared to women but in higher levels of innovative work behaviour both genders have the same turnover intention level. Hypothesis 8 is not supported at the established significance level for this study.
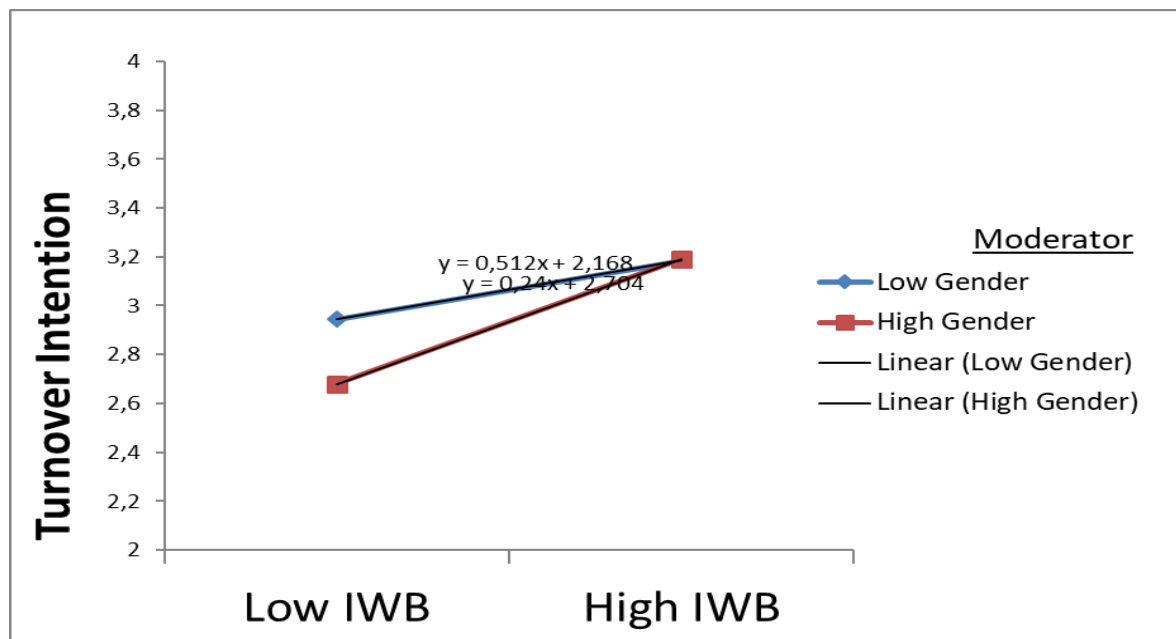
Figure 4.5: Gender as a moderator on direct relationship (Men-Low; Women-High)

Figure 4.5 depicts the dynamics of the innovative work behaviour and turnover intentions relationship when exposed to different genders. Although gender was not a significant moderator in the direct relationship at a 5% significance level, Figure 4.5 indicates that when innovative work behaviour is low men have a greater propensity to leave.

H9: Education moderates the relationship between individuals' innovation and turnover intentions amongst continuous learners.

Table 4.9-10: Standard Regression Path Significance for Education as Moderator

		Structural Paths		
			Estimate	P
TI	<---	IWBXHQ	,032	,326

Structural Paths				
TI	<---	ZHighestQualification	,032	,317

The value for P in for the product term of innovative work behaviour and education is greater than 0.05 at a value of p=0,326 in the table above. Education as a moderator does not have a significant effect on the innovative work behaviour and turnover intentions relationship. Hence, hypothesis 9 is not supported.

H10: Tenure moderates the relationship between individuals' innovation and turnover intentions amongst continuous learners.

Table 4.9-11: Standard Regression Path Significance for Tenure as Moderator

Structural Paths				
			Estimate	**P**
TI	**<---**	**IWBXTen**	**-,038**	**,256**
TI	<---	ZYearsinCompany	,007	,829

The value for P in for the product term of innovative work behaviour and education is greater than 0.05 at a value of p=0.326 in the table above. Education as a moderator does not have a significant effect on the innovative work behaviour and turnover intentions relationship. Hypothesis 10 is not supported.
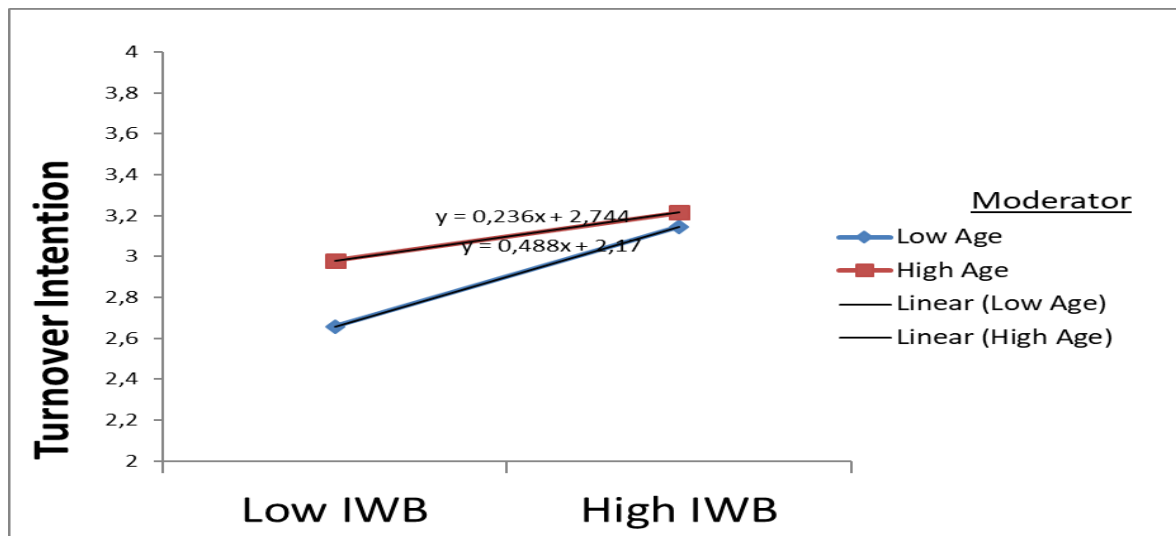
H11: Type of work moderates the relationship between individuals' innovation and turnover intentions amongst continuous learners.

Table 4.9-12: Standard Regression Path Significance for Job Complexity as Moderator

Structural Paths				
			Estimate	**P**
TI	<---	IWBXJc	-,006	,867
TI	<---	ZJC	,002	960

The value for p in for the product term of innovative work behaviour and job complexity is greater than 0.05 at a value of $p = 0.867$ in the table above. Job complexity as a moderator does not have a significant effect on the innovative work behaviour and turnover intentions relationship. Hence, hypothesis 11 is not supported.

Hypotheses 5 to 11 concerning moderation of variables on the relationship between innovative work behaviour and turnover intentions were not supported as all the interaction variables which were the product of innovative work behaviour and the respective moderators were established not to be significant with a p-value greater than 0.05. No moderation can be established from the proposed variables.

According to Fathema (2013), the regression weights are an indication of the direct effects that the determinants have on the dependent variable. Therefore, -.530 and .188 are the direct effects of core-self-evaluations and innovative work behaviour on turnover intentions. This would therefore mean that one full standard deviation increase in innovative work behaviour would increase turnover intentions by 0.188 whilst holding all other variables fixed. Similarly, one full standard deviation increase in core-self-evaluations would decrease turnover intentions whilst holding all other variables constant.

The established model resulted in an R^2 of 0.67 which indicates that innovative work behaviour, job satisfaction, Perceived supervisor support and core-self-evaluations jointly accounted for 67% of the variance in turnover intentions.

4.10 SUMMARY OF RESULTS

Table 4.10-1: Summary of Hypothesis Outcomes

Hypothesis		Outcome
H1	There is a significant association between innovation and turnover intentions among learners.	Supported
H2	Perceived Supervisor Support mediates the relationship between innovation and turnover intentions among learners.	Supported
H3	Job satisfaction mediates the relationship between innovation and turnover intentions among learners.	Supported
H4	There is a significant association between core- self-evaluations and turnover intentions among learners.	Supported
H5	Perceived distributive justice moderates the relationship between innovation and turnover intentions among learners.	Not Supported

H6	Core- self-evaluations moderate the relationship between innovation and turnover intentions among learners.	Not Supported
H7	Age moderates the relationship between innovation and turnover intentions among learners.	Not Supported
H8	Gender moderates the relationship between innovation and turnover intentions among learners.	Not Supported
H8	Education moderates the relationship between innovation and turnover intentions among learners.	Not Supported
H10	Tenure moderates the relationship between innovation and turnover intentions among learners.	Not Supported
H11	Type of work moderates the relationship between innovation and turnover intentions among learners.	Not Supported

4.11 Post Hoc Power

A post hoc analysis was conducted, and it was established that there was sufficient power to detect significant effects that may have existed. The non-significant effects that were established can be reported with confidence that they are non-significant.

4.12 FURTHER STATISTICAL ANALYSIS

4.12.1 Measurement Invariance

Configural invariance

Configural invariance is focussed on determining whether the same items measure the constructs in the study across multiple groups (Bialosiewicz, Murphy & Berry, 2013). To determine this, the model fit needs to be assessed. A configural invariance test was conducted and adequate goodness of model fit was obtained when analysing a freely estimated model across two groups. (RMSEA (0,044); CFI (0,897); SRMR (0,0830); TLI (0.883); PCLOSE (1,00); CMIN/DF 1.613

Metric

Following configural invariance, a metric invariances test was conducted. Metric invariance is concerned with ensuring that invariance in factor loadings is attained to certify that the constructs have the same meaning to respondents across different groups (Bialosiewicz, Murphy & Berry, 2013). A metric invariance test was conducted by constraining the two models to be equal and accomplished a chi-square difference test between the fully constrained and unconstrained models and established them to be invariant p-value = 0.123.

	Chi-square	**df**	**p-val**	**Invariant?**
Chi-square				
Unconstrained	2503,4	1580		
Fully constrained	2556,2	1622		
Number of groups		2		
Difference	52,8	42	0,123	YES

Figure 4.6: Metric Invariance Test

4.12.2 Common Method Bias

Harman Factor Test

Approximately 23% of the variance is explained by a single factor. It can be concluded that the dataset does not suffer from common method bias concerns as the variance explained by a single factor is less tham 50%.

Table 4.12-1: Harman Single-Factor Test

Total Variance Explained						
Factor	Initial Eigenvalues			Extraction Sums of Squared Loadings		
	Total	% of Variance	Cumulative %	Total	% of Variance	Cumulative %
1	17.642	24.848	24.848	16.533	23.287	23.287
2	5.689	8.012	32.860			
Extraction Method: Maximum Likelihood.						

Common Latent factor

The Harman single-factor test was criticised for its lack of ability to statistically control any method effects as the test merely provides an indication of whether only one factor accounts for the covariances between items (Podsakoff *et al*.,2003). By using the Gaskin (2018) plugin, this study checked the presence of common method bias with the use of a Common Latent factor. The plugin ran two tests which checked for the presence of specific bias through the zero constraints test and proceeded to conduct an equal constraints test to determine if the bias was evenly distributed.

Table 4.12-2: Zero Constraints Test Output (is there specific bias?)

	X2	DF	Delta	p-value
Unconstrained Model	1259,000	421	X^2=174,000 DF=32	0,000
Zero Constrained Model	1433,000	389		

Table 4.12-3: Equal Constraints Test (is bias evenly distributed?)

	X2	DF	Delta	p-value
Unconstrained Model	1259,000	421	X^2=168,000 DF=491	1,000
Equal Constrained Model	1427,000	912		

When a common latent factor was used, the Chi-square test for the zero constrained model was significant. Measurable bias was detected. Following a bias distribution test of equal constraints conducted with the use of a plugin, it was established that the bias was equally distributed. A test of equal specific bias demonstrated evenly distributed bias.

Common Method Bias with a Marker Variable

Table 4.12-4: Zero Constraints Test (is there specific bias?)

	X2	DF	Delta	p-value
Unconstrained Model	1758,000	991	X^2=94,000 DF=496	1,000
Zero Constrained Model	1852,000	495		

With the use of social desirability as a marker variable, the null hypothesis was not rejected. No specific response bias affecting the model was detected and in response, no bias distribution test was made and the researcher proceeded to modelling.

4.12.3 Critical Ratios

The researcher further conducted tests of differences in structural paths with the use of critical ratios to identify significant differences in the variables. Significant differences were identified for gender, age, highest qualification and tenure which will be outlined from Table 4.11-5 to 4.11-8.

Table 4.12-5: Critical Ratios Output - Gender

			Men		Women		
			Estimate	P	Estimate	P	z-score
TI	<---	IWB	0,065	0,387	0,250	0,000	1,97**
Notes: *** p-value < 0.01; ** p-value < 0.05; * p-value < 0.10							

The standardised parameter estimate for the men group is 0.065 whilst the same estimate for the women group is 0.250. It can be concluded that the effect of innovative work behaviour on turnover intentions is more pronounced for women than it is for men (p-value < 0.05).

For the sections to follow, the data was grouped into two groups one being below the median (Low) and the other above the median (high) to depict how the relationships between the various variables would vary in cases where the variable was high compared to when it was low.

Table 4.12-6: Critical Ratios Output - Age

			AGE-LOW		AGE-HIGH		
			Estimate	P	Estimate	P	z-score
PSS	<---	IWB	0,777	0,000	0,402	0,004	-1,982**
Notes: *** p-value < 0.01; ** p-value < 0.05; * p-value < 0.10							

The standardised parameter estimate for the low age group is 0.777 whilst the same estimate for the high age group is 0.402. It can be concluded that the effect of innovative work behaviour on perceived supervisor support is more pronounced for the low age group. Innovative work behaviour was established to be strongly associated with perceived supervisor support when age was low in comparison to when age was higher (p-value < 0.05).

Table 4.12-7: Critical Ratios Output - Highest Qualification

			HQ- LOW		HQ-HIGH		
			Estimate	P	Estimate	P	z-score
TI	<---	CSE	-0,853	0,000	-0,446	0,000	2,553**
TI	<---	PanasAvg	-0,015	0,853	0,193	0,000	2,24**
TI	<---	PSS	-0,104	0,026	-0,224	0,000	-2,247**
Notes: *** p-value < 0.01; ** p-value < 0.05; * p-value < 0.10							

Concerning highest qualification, core-self-evaluations were established to be strongly associated with turnover in cases of low levels of education with an estimate of -0.853 compared to higher levels of education which has an estimate of -0.446 (p-value < 0.05). On the other hand, perceived supervisor support was established to be strongly associated with turnover in cases of high levels of education when compared to low levels of education (p-value < 0.05).

Table 4.12-8: Critical Ratios Output - Tenure

			TENURE-LOW		TENURE- HIGH		
			Estimate	P	Estimate	P	z-score
JS	<--	IWB	**0,377**	**0,000**	**0,173**	**0,073**	**-1,864***
Notes: *** p-value < 0.01; ** p-value < 0.05; * p-value < 0.10							

For tenure, innovative work behaviour was established to be strongly associated with job satisfaction when tenure was lower in comparison to when tenure is higher (p-value < 0.10). Table 4.12-8 indicates that at low tenure the standardised parameter estimate is 0.377 whilst the estimate for high tenure is 0.173. It can be concluded that the effect of innovative work behaviour on job satisfaction is more pronounced for the tenure group.

4.12.4 Difference Tests

Table 4.12-9: Difference Test - Highest Qualification

Path Name	Hqlow Beta	Hqhigh Beta	Difference in Betas	P-Value for Difference	Interpretation
IWB → TI.	0,027	0,210***	-0,182	1,000	**The positive relationship between TI and IWB is only significant for Hqhigh.**
PanasAvg → TI.	-0,017	0,224***	-0,241	1,000	The positive relationship between TI and PanasAvg is only significant for Hqhigh.

Table 4.12-10: Difference Test - Tenure

Path Name	Tenurelow Beta	TenureHigh Beta	Difference in Betas	P-Value for Difference	Interpretation
IWB → TI.	0,208***	0,050	0,159	1,000	The positive relationship between TI and IWB is only significant for Tenurelow.

PanasAvg → TI.	0,202***	0,089	0,113	1,000	The positive relationship between TI and PanasAvg is only significant for Tenurelow.

4.12.5 Hayes Three-way Interaction

Table 4.12-11: 3-Way interaction - Age and Tenure

Model = 3
Y = TI
X = IWB
M = Age
W = YearsinC
Sample size
321
****
Outcome: TI
Model Summary
R R-sq MSE F df1 df2 p
,2228 ,0496 1,3012 2,3348 7,0000 313,0000 ,0246
Model
coeff se t p LLCI ULCI
constant 5,3526 2,2062 2,4262 ,0158 1,0118 9,6934
Age -,0883 ,0686 -1,2869 ,1991 -,2232 ,0467
IWB -,9784 ,5575 -1,7550 ,0802 -2,0754 ,1185
int_1 ,0232 ,0174 1,3388 ,1816 -,0109 ,0574
YearsinC -,7217 ,3536 -2,0409 ,0421 -1,4175 -,0259
int_2 ,1573 ,0903 1,7415 ,0826 -,0204 ,3350
int_3 ,0192 ,0098 1,9465 ,0525 -,0002 ,0385
int_4 -,0044 ,0025 -1,7373 **,0833** -,0093 ,0006
Product terms key:
int_1 IWB X Age
int_2 IWB X YearsinC
int_3 Age X YearsinC
int_4 IWB X Age X YearsinC
R-square increase attributable to three-way interaction:
R2-chng F(1,df2) df2 p
int_4 ,0092 3,0181 313,0000 **,0833**
****
Conditional effect of X on Y at values of the moderator(s):
YearsinC Age Effect se t p LLCI ULCI
2,0757 23,3452 -,3212 ,1341 -2,3951 ,0172 -,5851 -,0573
2,0757 31,3076 -,2084 ,1006 -2,0704 ,0392 -,4064 -,0103
2,0757 39,2700 -,0956 ,1574 -,6071 ,5443 -,4053 ,2142
6,5591 23,3452 -,0730 ,1192 -,6123 ,5408 -,3076 ,1616
6,5591 31,3076 -,1161 ,0789 -1,4717 ,1421 -,2713 ,0391
6,5591 39,2700 -,1591 ,1022 -1,5578 ,1203 -,3602 ,0419
11,0425 23,3452 ,1752 ,2483 ,7055 ,4810 -,3134 ,6637
11,0425 31,3076 -,0238 ,1497 -,1588 ,8740 -,3184 ,2709
11,0425 39,2700 -,2227 ,1316 -1,6923 ,0916 -,4817 ,0362

Values for quantitative moderators are the mean and plus/minus one SD from mean.
Values for dichotomous moderators are the two values of the moderator.
Conditional effect of X*M interaction at values of W:
YearsinC Effect se t p LLCI ULCI
2,0757,0142,0133 1,0634,2884 -,0120,0404
6,5591 -,0054,0098 -,5511,5820 -,0247,0139
11,0425 -,0250,0164 -1,5231,1288 -,0573,0073
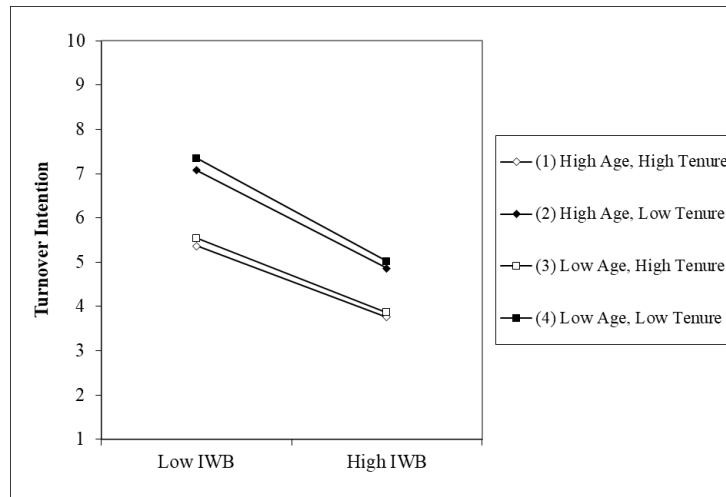
Figure 4.7: Three-way interaction graph - Tenure

At a 10% level of significance, Figure 4.7 indicates that in cases of low innovative work behaviour those with low age and low tenure have a greater turnover intention when compared to those with high age and low tenure. In cases of high tenure individuals with lower age have greater turnover intentions in cases of low innovative work behaviour.

Table 4.12-12: Three-way interaction - Gender and Tenure

Model = 3
Y = TI
X = IWB
M = Gender
W = YearsinC
Sample size
321
****
Outcome: TI
Model Summary
R R-sq MSE F df1 df2 p
,2415,0583 1,2893 2,7695 7,0000 313,0000,0083
Model
coeff se t p LLCI ULCI
constant 3,9353,7666 5,1333,0000 2,4269 5,4436
Gender -3,0971 1,0010 -3,0939,0022 -5,0666 -1,1275
IWB -,6288,1923 -3,2702,0012 -1,0071 -,2505

120

int_1,8134,2587 3,1444,0018,3044 1,3224					
YearsinC -,2585,1057 -2,4458,0150 -,4665 -,0505					
int_2,0646,0266 2,4286,0157,0123,1169					
int_3,4520,1476 3,0616,0024,1615,7426					
int_4 -,1232,0382 -3,2229,0014 -,1984 -,0480					

Product terms key:

int_1 IWB X Gender
int_2 IWB X YearsinC
int_3 Gender X YearsinC
int_4 IWB X Gender X YearsinC

R-square increase attributable to three-way interaction:

R2-chng F(1,df2) df2 p

int_4,0313 10,3871 313,0000,**0014**

****

Conditional effect of X on Y at values of the moderator(s):

YearsinC Gender Effect se t p LLCI ULCI

2,0757,0000 -,4947,1488 -3,3256,0010 -,7875 -,2020
2,0757 1,0000,0630,1282,4913,6235 -,1893,3153
6,5591,0000 -,2053,1043 -1,9688,0499 -,4104 -,0001
6,5591 1,0000 -,1998,0971 -2,0573,0405 -,3909 -,0087
11,0425,0000,0842,1674,5028,6154 -,2452,4135
11,0425 1,0000 -,4626,1809 -2,5567,0110 -,8186 -,1066

Values for quantitative moderators are the mean and plus/minus one SD from mean.

Values for dichotomous moderators are the two values of the moderator.

Conditional effect of X*M interaction at values of W:

YearsinC Effect se t p LLCI ULCI

2,0757,5577,1964 2,8398,0048,1713,9442
6,5591,0055,1425,0385,9693 -,2749,2858
11,0425 -,5468,2465 -2,2182,0273 -1,0318 -,0618

******************** JOHNSON-NEYMAN TECHNIQUE ************************

Moderator value(s) defining Johnson-Neyman significance region(s)

Value % below % above

4,2033 30,2181 69,7819
10,0633 85,3583 14,6417

Conditional effect of X*M on Y at values of the moderator (W)

YearsinC Effect se t p LLCI ULCI

,0000,8134,2587 3,1444,0018,3044 1,3224
1,7000,6040,2068 2,9207,0037,1971 1,0109
3,4000,3946,1645 2,3987,0170,0709,7183
4,2033,2957,1503 1,9676,0500,0000,5913
5,1000,1852,1407 1,3161,1891 -,0917,4621
6,8000 -,0242,1449 -,1670,8675 -,3092,2608
8,5000 -,2336,1750 -1,3352,1828 -,5778,1106
10,0633 -,4262,2166 -1,9676,0500 -,8523,0000
10,2000 -,4430,2206 -2,0079,0455 -,8771 -,0089
11,9000 -,6524,2742 -2,3793,0179 -1,1919 -,1129
13,6000 -,8618,3319 -2,5968,0099 -1,5148 -,2088
15,3000 -1,0712,3918 -2,7338,0066 -1,8422 -,3002
17,0000 -1,2806,4532 -2,8258,0050 -2,1723 -,3889
18,7000 -1,4900,5154 -2,8909,0041 -2,5042 -,4759
20,4000 -1,6994,5783 -2,9388,0035 -2,8372 -,5616
22,1000 -1,9088,6415 -2,9754,0032 -3,1711 -,6466
23,8000 -2,1182,7051 -3,0041,0029 -3,5056 -,7309
25,5000 -2,3277,7689 -3,0272,0027 -3,8406 -,8147

27,2000 -2,5371,8329 -3,0460,0025 -4,1759 -,8982
28,9000 -2,7465,8970 -3,0617,0024 -4,5115 -,9815
30,6000 -2,9559,9613 -3,0749,0023 -4,8473 -1,0645
32,3000 -3,1653 1,0256 -3,0862,0022 -5,1833 -1,1473
34,0000 -3,3747 1,0900 -3,0959,0021 -5,5194 -1,2300
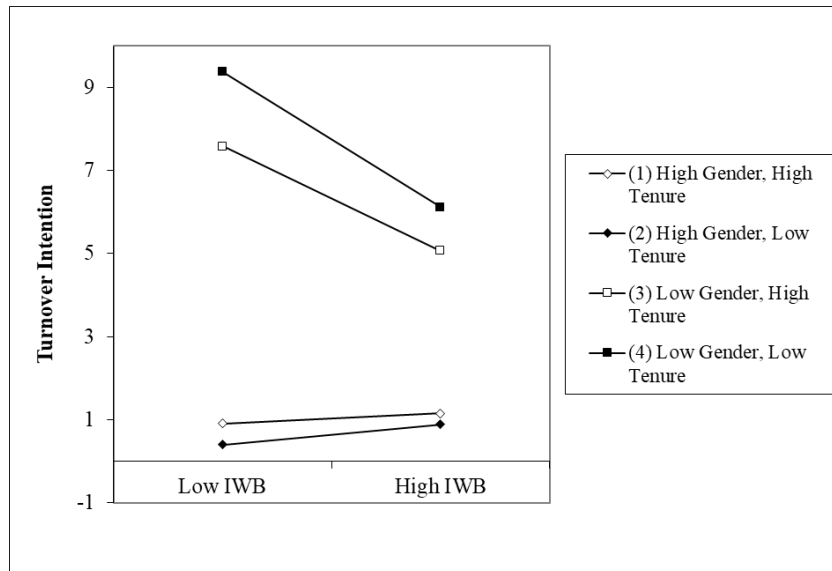
Figure 4.8: Three-way interaction graph - Gender and Tenure

Figure 4.8 emphasises that when tenure is low, men have greater turnover intentions compared to women in cases of low innovative work behaviour. In cases of high tenure women have greater turnover intentions with high innovative work behaviour.

Table 4.12-13: Three-way interaction - Tenure and Gender

Model = 3
Y = TI
X = IWB
M = YearsinC
W = Gender
Sample size
321
****
Outcome: TI
Model Summary
R R-sq MSE F df1 df2 p
,2415,0583 1,2893 2,7695 7,0000 313,0000,0083
Model
coeff se t p LLCI ULCI
constant 1,4087,0640 22,0031,0000 1,2827 1,5347
YearsinC -,0221,0150 -1,4691,1428 -,0516,0075
IWB -,2019,0721 -2,8009,0054 -,3437 -,0601
int_1 -,0118,0198 -,5961,5515 -,0508,0271
Gender -,1117,1321 -,8457,3984 -,3715,1482
int_2,0055,1425,0385,9693 -,2749,2858

int_3 -,0050,0290 -,1720,8635 -,0621,0521						
int_4 -,1232,0382 -3,2229,0014 -,1984 -,0480						
Product terms key:						
int_1 IWB X YearsinC						
int_2 IWB X Gender						
int_3 YearsinC X Gender						
int_4 IWB X YearsinC X Gender						
R-square increase attributable to three-way interaction:						
R2-chng F(1,df2) df2 p						
int_4,0313 10,3871 313,0000,0014						
**						
Conditional effect of X on Y at values of the moderator(s):						
Gender YearsinC Effect se t p LLCI ULCI						
-,6199 -4,4834 -,4947,1488 -3,3256,0010 -,7875 -,2020						
-,6199,0000 -,2053,1043 -1,9688,0499 -,4104 -,0001						
-,6199 4,4834,0842,1674,5028,6154 -,2452,4135						
,3801 -4,4834,0630,1282,4913,6235 -,1893,3153						
,3801,0000 -,1998,0971 -2,0573,0405 -,3909 -,0087						
,3801 4,4834 -,4626,1809 -2,5567,0110 -,8186 -,1066						
Values for quantitative moderators are the mean and plus/minus one SD from mean.						
Values for dichotomous moderators are the two values of the moderator.						
Conditional effect of X*M interaction at values of W:						
Gender Effect se t p LLCI ULCI						
-,6199,0646,0266 2,4286,0157,0123,1169						
,3801 -,0586,0275 -2,1346,0336 -,1126 -,0046						
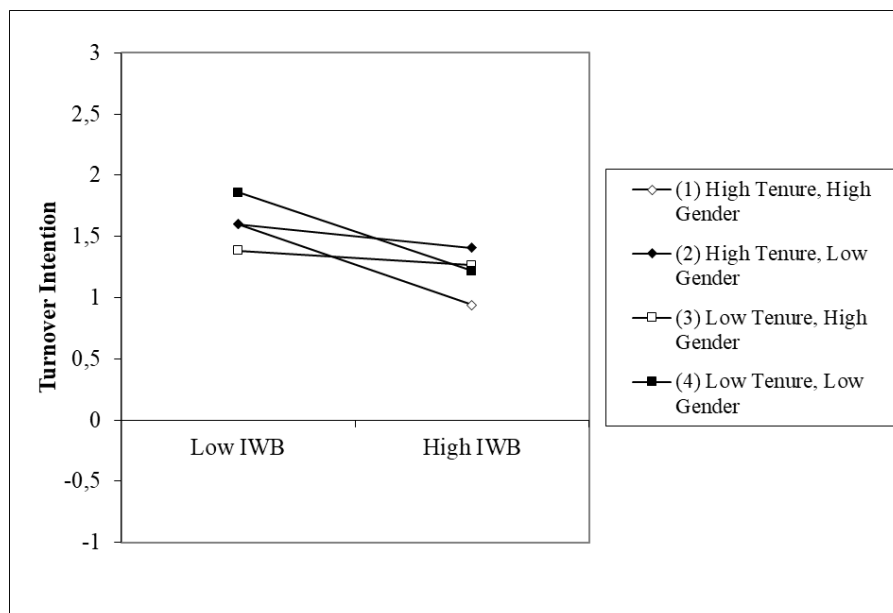
Figure 4.9: Three-way interaction - Tenure and Gender

Figure 4.9 shows that when tenure is low, in cases of low innovative work behaviour men have higher turnover intentions when compared to women. In the cases of high tenure, men and

women's turnover intentions differ significantly when innovative work behaviour is high with men showing higher turnover intentions.

Table 4.12-14: Three-way interaction - Tenure and Gender

Model = 3
Y = TI
X = IWB
M = YearsinC
W = Age
Sample size
321
****
Outcome: TI
Model Summary
R R-sq MSE F df1 df2 p
,2228,0496 1,3012 2,3348 7,0000 313,0000,0246
Model
coeff se t p LLCI ULCI
constant 1,3599,0688 19,7711,0000 1,2246 1,4953
YearsinC -,0454,0192 -2,3615,0188 -,0832 -,0076
IWB -,1161,0789 -1,4717,1421 -,2713,0391
int_1,0206,0224,9204,3581 -,0234,0646
Age,0174,0092 1,8932,0593 -,0007,0354
int_2 -,0054,0098 -,5511,5820 -,0247,0139
int_3,0030,0015 1,9430,0529,0000,0060
int_4 -,0044,0025 -1,7373,0833 -,0093,0006
Product terms key:
int_1 IWB X YearsinC
int_2 IWB X Age
int_3 YearsinC X Age
int_4 IWB X YearsinC X Age
R-square increase attributable to three-way interaction:
R2-chng F(1,df2) df2 p
int_4,0092 3,0181 313,0000,0833
****
Conditional effect of X on Y at values of the moderator(s):
Age YearsinC Effect se t p LLCI ULCI
-7,9624 -4,4834 -,3212,1341 -2,3951,0172 -,5851 -,0573
-7,9624,0000 -,0730,1192 -,6123,5408 -,3076,1616
-7,9624 4,4834,1752,2483,7055,4810 -,3134,6637
,0000 -4,4834 -,2084,1006 -2,0704,0392 -,4064 -,0103
,0000,0000 -,1161,0789 -1,4717,1421 -,2713,0391
,0000 4,4834 -,0238,1497 -,1588,8740 -,3184,2709
7,9624 -4,4834 -,0956,1574 -,6071,5443 -,4053,2142
7,9624,0000 -,1591,1022 -1,5578,1203 -,3602,0419
7,9624 4,4834 -,2227,1316 -1,6923,0916 -,4817,0362
Values for quantitative moderators are the mean and plus/minus one SD from mean.
Values for dichotomous moderators are the two values of the moderator.
Conditional effect of X*M interaction at values of W:

Age	Effect	se	t	p	LLCI	ULCI
-7,9624	,0554	,0357	1,5512	,1219	-,0149	,1256
,0000	,0206	,0224	,9204	,3581	-,0234	,0646
7,9624	-,0142	,0230	-,6171	,5376	-,0594	,0310
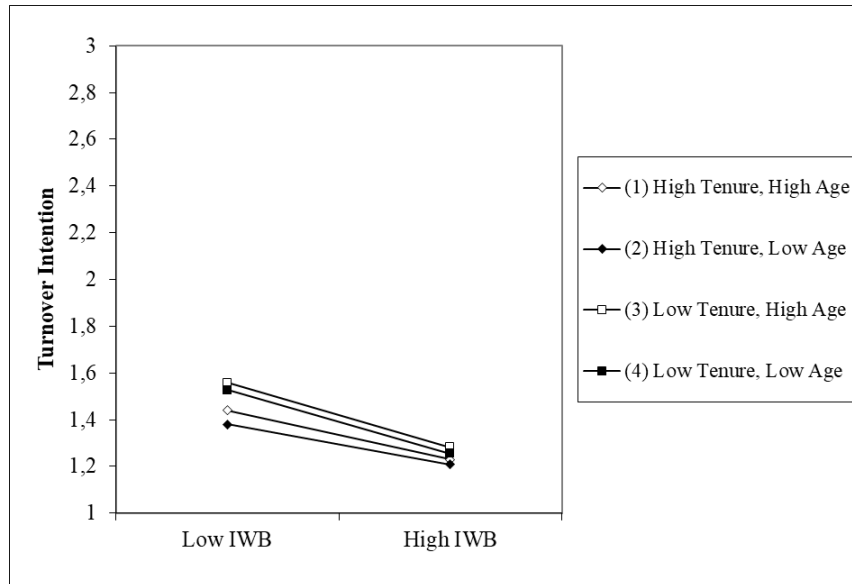
Figure 4.10: Three-way interaction - Tenure and Age

Figure 4.10 shows no drastic difference between individuals with high and low age levels at different levels of tenure. However, at low tenure and high age individuals have a greater propensity to want to leave when innovative work behaviour is low in comparison to those with high age and high tenure. Yet, when innovative work behaviour is high, there are no major differences in the various groups when it comes to turnover intentions.

4.12.6 Moderated Mediation

Table 4.12-15: Moderated Mediation - Job Satisfaction and Core-Self-evaluations

Model = 7
Y = AvgTI
X = AvgIWB
M = AvgJS
W = Avgcse
Sample size
321
****
Outcome: AvgJS
Model Summary
R R-sq MSE F df1 df2 p

125

,5284,2792,3774 42,0445 3,0000 317,0000,0000					
Model					
coeff se t p LLCI ULCI					
constant 3,5269,0352 100,0772,0000 3,4576 3,5962					
AvgIWB,1597,0351 4,5543,0000,0907,2287					
Avgcse,5352,0621 8,6163,0000,4130,6574					
int_1 -,1061,0510 -2,0821,0381 -,2063 -,0058					
Product terms key:					
int_1 AvgIWB X Avgcse					
**					
Outcome: AvgTI					
Model Summary					
R R-sq MSE F df1 df2 p					
,5525,3052,8616 67,1159 2,0000 318,0000,0000					
Model					
coeff se t p LLCI ULCI					
constant 7,2894,2740 26,6040,0000 6,7503 7,8285					
AvgJS -,8850,0769 -11,5093,0000 -1,0363 -,7338					
AvgIWB,1212,0493 2,4569,0145,0241,2183					
******************** DIRECT AND INDIRECT EFFECTS *************************					
Direct effect of X on Y					
Effect SE t p LLCI ULCI					
,1212,0493 2,4569,0145,0241,2183					
Conditional indirect effect(s) of X on Y at values of the moderator(s):					
Mediator					
Avgcse Effect Boot SE BootLLCI BootULCI					
AvgJS -,5819 -,1960,0502 -,3061 -,1036					
AvgJS,0000 -,1413,0334 -,2099 -,0800					
AvgJS,5819 -,0867,0337 -,1605 -,0294					
Values for quantitative moderators are the mean and plus/minus one SD from mean.					
Values for dichotomous moderators are the two values of the moderator.					
******************** INDEX OF MODERATED MEDIATION ************************					
Mediator					
Index SE(Boot) BootLLCI BootULCI					
AvgJS,0939,0459,0034,1846					
******************** ANALYSIS NOTES AND WARNINGS *************************					
Number of bootstrap samples for bias corrected bootstrap confidence intervals:					
5000					
Level of confidence for all confidence intervals in output:					
95,00					

Table 4.12-15 shows a significant moderating effect of core self-evaluations on the relationship between innovative work behaviour (Independent variable) and job satisfaction (Mediator).

Table 4.12-16: Moderated Mediation - Job Satisfaction and Type of Work

Model = 7
Y = AvgTI
X = AvgIWB
M = AvgPss
W = Age
Sample size
321
****
Outcome: AvgPss
Model Summary
R R-sq MSE F df1 df2 p
,3130,0979 2,4899 12,1085 3,0000 317,0000,0000
Model
coeff se t p LLCI ULCI
constant 4,4288,0888 49,8785,0000 4,2541 4,6035
AvgIWB,4331,0830 5,2204,0000,2699,5963
Age,0043,0106,4088,6830 -,0165,0251
int_1 -,0195,0097 -2,0036,0460 -,0386 -,0004
Product terms key:
int_1 AvgIWB X Age
****
Outcome: AvgTI
Model Summary
R R-sq MSE F df1 df2 p
,4634,2147,9738 43,1911 2,0000 318,0000,0000
Model
coeff se t p LLCI ULCI
constant 5,6100,1608 34,8947,0000 5,2937 5,9263
AvgPss -,3247,0353 -9,2101,0000 -,3940 -,2553
AvgIWB,1043,0601 1,7367,0834 -,0139,2225
******************* DIRECT AND INDIRECT EFFECTS *************************
Direct effect of X on Y
Effect SE t p LLCI ULCI
,1043,0601 1,7367,0834 -,0139,2225
Conditional indirect effect(s) of X on Y at values of the moderator(s):
Mediator
Age Effect Boot SE BootLLCI BootULCI
AvgPss -7,9624 -,1909,0378 -,2713 -,1243
AvgPss,0000 -,1406,0303 -,2067 -,0867
AvgPss 7,9624 -,0903,0410 -,1749 -,0140
Values for quantitative moderators are the mean and plus/minus one SD from mean.
Values for dichotomous moderators are the two values of the moderator.
******************* INDEX OF MODERATED MEDIATION ***********************

Mediator			
Index SE(Boot) BootLLCI BootULCI			
AvgPss,0063,0032,0006,0131			
******************** ANALYSIS NOTES AND WARNINGS *************************			
Number of bootstrap samples for bias corrected bootstrap confidence intervals:			
5000			
Level of confidence for all confidence intervals in output:			
95,00			

Table 4.12-16 shows a significant moderating effect of age on the relationship between innovative work behaviour (Independent variable) and perceived supervisor support (Mediator).

Table 4.12-17: Moderated Mediation - Perceived Supervisor Support and Age

Model = 14
Y = AvgTI
X = AvgIWB
M = AvgPss
V = Age
Sample size
321
****
Outcome: AvgPss
Model Summary
R R-sq MSE F df1 df2 p
,2953,0872 2,5037 25,0248 1,0000 319,0000,0000
Model
coeff se t p LLCI ULCI
constant -1,9846,4157 -4,7737,0000 -2,8026 -1,1667
AvgIWB,4256,0851 5,0025,0000,2582,5929
****
Outcome: AvgTI
Model Summary
R R-sq MSE F df1 df2 p
,5012,2512,9345 26,5176 4,0000 316,0000,0000
Model
coeff se t p LLCI ULCI
constant 3,7898,2820 13,4369,0000 3,2349 4,3448
AvgPss -,3260,0345 -9,4521,0000 -,3939 -,2582
AvgIWB,0839,0583 1,4407,1507 -,0307,1986
Age,0221,0070 3,1677,0017,0084,0359
int_1 -,0094,0045 -2,1013,0364 -,0182 -,0006
Product terms key:

int_1 AvgPss X Age

********************** DIRECT AND INDIRECT EFFECTS *************************

Direct effect of X on Y

Effect SE t p LLCI ULCI

,0839,0583 1,4407,1507 -,0307,1986

Conditional indirect effect(s) of X on Y at values of the moderator(s):

Mediator

Age Effect Boot SE BootLLCI BootULCI

AvgPss -7,9624 -,1069,0281 -,1719 -,0593

AvgPss,0000 -,1387,0309 -,2037 -,0819

AvgPss 7,9624 -,1706,0411 -,2610 -,0980

Values for quantitative moderators are the mean and plus/minus one SD from mean.

Values for dichotomous moderators are the two values of the moderator.

********************** INDEX OF MODERATED MEDIATION *************************

Mediator

Index SE(Boot) BootLLCI BootULCI

AvgPss -,0040,0021 -,0089 -,0006

********************** ANALYSIS NOTES AND WARNINGS *************************

Number of bootstrap samples for bias corrected bootstrap confidence intervals:

5000

Level of confidence for all confidence intervals in output:

95,00

Table 4.12-17 shows a significant moderating effect of age on the relationship between perceived supervisor support (Mediator) and turnover intentions (dependent variable).

Table 4.12-18: Moderated Mediation - Job Satisfaction and Type of Work

Model = 14
Y = AvgTI
X = AvgIWB
M = AvgJS
V = Avgjc
Sample size
321

```
***************************************************************************

Outcome: AvgJS


Model Summary

  R R-sq MSE F df1 df2 p

,2792,0779,4798 16,7752 1,0000 319,0000,0001


Model

  coeff se t p LLCI ULCI

constant -,8170,2131 -3,8338,0002 -1,2363 -,3977

AvgIWB,1752,0428 4,0958,0001,0910,2593


***************************************************************************

Outcome: AvgTI


Model Summary

  R R-sq MSE F df1 df2 p

,5675,3220,8461 35,5641 4,0000 316,0000,0000


Model

  coeff se t p LLCI ULCI

constant 3,6401,2385 15,2646,0000 3,1709 4,1092

AvgJS -,8886,0815 -10,9073,0000 -1,0489 -,7283
```

AvgIWB,1218,0497 2,4538,0147,0241,2195

Avgjc -,0600,0506 -1,1867,2362 -,1595,0395

int_1 -,1546,0511 -3,0221,0027 -,2552 -,0539

Product terms key:

int_1   AvgJS   X   Avgjc

******************** DIRECT AND INDIRECT EFFECTS ************************

Direct effect of X on Y

Effect SE t p LLCI ULCI

,1218,0497 2,4538,0147,0241,2195

Conditional indirect effect(s) of X on Y at values of the moderator(s):

Mediator

Avgjc Effect Boot SE BootLLCI BootULCI

AvgJS -1,0357 -,1276,0359 -,2048 -,0637

AvgJS,0000 -,1557,0422 -,2415 -,0775

AvgJS 1,0357 -,1837,0504 -,2898 -,0919

Values for quantitative moderators are the mean and plus/minus one SD from mean.

Values for dichotomous moderators are the two values of the moderator.

******************* INDEX OF MODERATED MEDIATION ***********************
Mediator
Index SE(Boot) BootLLCI BootULCI
AvgJS -,0271,0113 -,0533 -,0086
******************* ANALYSIS NOTES AND WARNINGS ************************
Number of bootstrap samples for bias corrected bootstrap confidence intervals:
5000
Level of confidence for all confidence intervals in output:
95,00

Table 4.12-18 shows a significant moderating effect of job complexity on the relationship between job satisfaction (Mediator) and turnover intentions (dependent variable).

Table 4.12-19: Moderated Mediation - Job Satisfaction and Age

Model = 14
Y = AvgTI
X = AvgIWB
M = AvgJS
V = Age
Sample size
321
****
Outcome: AvgJS
Model Summary
R R-sq MSE F df1 df2 p
,2792,0779,4798 16,7752 1,0000 319,0000,0001
Model
coeff se t p LLCI ULCI

constant -,8170,2131 -3,8338,0002 -1,2363 -,3977					
AvgIWB,1752,0428 4,0958,0001,0910,2593					

****

Outcome: AvgTI

Model Summary

R R-sq MSE F df1 df2 p
,5821,3388,8251 41,6367 4,0000 316,0000,0000

Model

coeff se t p LLCI ULCI
constant 3,6517,2222 16,4340,0000 3,2145 4,0888
AvgJS -,8866,0751 -11,8001,0000 -1,0344 -,7388
AvgIWB,1125,0461 2,4377,0153,0217,2033
Age,0203,0062 3,2573,0012,0080,0325
int_1 -,0245,0093 -2,6462,0085 -,0428 -,0063

Product terms key:

int_1 AvgJS X Age

******************** DIRECT AND INDIRECT EFFECTS ************************

Direct effect of X on Y

Effect SE t p LLCI ULCI
,1125,0461 2,4377,0153,0217,2033

Conditional indirect effect(s) of X on Y at values of the moderator(s):

Mediator

Age Effect Boot SE BootLLCI BootULCI
AvgJS -7,9624 -,1211,0347 -,1946 -,0606
AvgJS,0000 -,1553,0401 -,2373 -,0793
AvgJS 7,9624 -,1895,0497 -,2934 -,0976

Values for quantitative moderators are the mean and plus/minus one SD from mean.
Values for dichotomous moderators are the two values of the moderator.

******************** INDEX OF MODERATED MEDIATION ************************

Mediator

Index SE(Boot) BootLLCI BootULCI
AvgJS -,0043,0019 -,0086 -,0012

******************** ANALYSIS NOTES AND WARNINGS ************************

Number of bootstrap samples for bias corrected bootstrap confidence intervals:
5000

Level of confidence for all confidence intervals in output:
95,00

Table 4.12-19 shows a significant moderating effect of age on the relationship between job satisfaction (Mediator) and turnover intentions (dependent variable).

4.13 SUMMARY OF DATA ANALYSIS RESULTS

This chapter has presented the results from the data analysis. This chapter began with a descriptive statistics section which provided information into the demographic profile of the respondents in the study and proceeded to providing the mean and standard deviations of each of the constructs in the study. The data was screened for missing values and were handled accordingly and no issues pertaining to skewness and kurtosis were found. The correlation matrix provided a summary relating to how the various variables were correlated and which constructs presented strong correlations. Furthermore, the variables were found to be internally consistent. The exploratory analysis yielded a clean pattern matrix that was transported into AMOS. Also, the measurement model showed good model fit making it possible for SEM after the common method bias adjustments. This chapter also ensured that various issues pertaining to validity were considered as well as ensure that the multivariate assumptions were met.

Moreover, this chapter tested the associations, mediation and moderation based on the hypothesis derived in Chapter 1. This chapter concluded with the presentation of results obtained from further analysis.

Chapter 5 entails a discussion of the results of the data analysis and outline linkages to theory.

CHAPTER 5

DISCUSSION

5.1 INTRODUCTION

The previous chapter documented the results of the various statistical procedures that were executed. The results of the descriptive statistics, factor analysis, confirmatory factor analysis and SEM were presented along with the results of multivariate assumptions, reliability and validity and common method bias.

This chapter will focus on the discussion of the outcome of the hypothesis testing in alignment with literature and derive insights into what the results mean in a South African context. This chapter will firstly discuss the descriptive statistics, followed by the discussion of each hypothesis.

5.2 DEMOGRAPHIC PROFILE

This study was comprised of mostly female respondents who accounted for 62% of the entire sample. With a total of 201 female respondents, the male respondents only accounted for the remaining percentage which indicates an uneven distribution concerning gender in the study. Furthermore, respondents below the age of 25 accounted for 28% of the surveyed sample followed by individuals within the 31-35-year bracket. This study was well represented concerning accounting for the various age brackets of individuals as most brackets accounted for at least 20% of the surveyed sample.

Concerning race, the African population accounted for over 60% of the surveyed sample with a total of 204 respondents identifying themselves in the race category of African. As a result, the remaining races were marginally represented in the study Also, the study sampled respondents from over six different industries within the South African working industry gaining a holistic and general overview on what the proposed relationship is when surveying individuals across various industries and sectors.

Also, 79% of the respondents reported to be working full-time which is an important aspect concerning analysing findings. This statistic implies that 80% of the respondents were employed on a full-time basis in organisations across Gauteng and can provide insight into employees within organisations. Furthermore, the majority of the respondents hold a supervisory function in their place of work further enhancing the justification to understanding and gaining further knowledge into how the specific population can be retained within an organisation and what factors contribute to their desire to want to resign in hopes that organisations can derive effect policies and strategies to effectively retain them.

5.3 CORRELATION MATRIX

The correlation matrix revealed a moderate correlation between variables that were not hypothesised in the study such as the correlation between core-self-evaluations and distributive justice and core-self-evaluation with job satisfaction which identifies potential associations that may be considered in future studies. As revealed in literature, the correlation matrix indicated core-self-evaluations to be negatively corconcerning turnover intentions.

Furthermore, an unforeseen moderately strong positive correlation was established between perceived supervisor support and job satisfaction which is a potential relationship that may be further investigated in future studies. Also, a negative correlation was established between job satisfaction and turnover intentions which supports findings by various authors who have also established a negative correlation between job satisfaction in various contexts such as India (Randhawa, 2007), Tanzania (Amani & Komba, 2016) and France (Hofaidhllaoui & Chhinzer, 2014).

5.4 RESEARCH QUESTION 1

To what extent does innovative work behaviour influence turnover intentions?

H1: There is a significant association between innovativeness and turnover intentions amongst continuous learners.

Hypothesis 1 was supported in the study. This study established a significant positive relationship between innovative work behaviour and turnover intentions. Similarly, studies have established a relationship between innovative work behaviour and turnover intentions of employees that were conducted in various contexts such as United States, Indonesia, Turkey and Australia (Demircioglu 2017; Eriksson, Qin & Wang, 2014; Ettlie, 1985; Kesen, 2016; Li, Duverger & Yu, 2018; Müller & Peters, 2010; Price, 1977; Robinson & Beesley, 2010; Shalley, 2000; Shalley, Gilson & Blum, 2000; Shalley, Zhou & Oldham, 2004; Shih & Susanto, 2011; Stradinger, 2016; Wang & Ma, 2013). Within a South African context, the relationship is supported.

The direction of the relationship that exists between innovativeness and turnover intentions is unclear. According to various authors, an increase in creativity results in higher turnover intentions (Li, Duverger & Yu, 2018; Robinson & Beesley, 2010). Conversely, authors have also reported creative climate directly predicted lower turnover intentions and contribute

positively to their employee's intention to remain with their employer, but findings of this study indicate the opposite (Demircioglu 2017; Ettlie, 1985; Lin, 2016; Mizrahi, 2018; Price, 1977). Also, a study with a similar sample in the United States with graduate and undergraduate student respondents established that organisations that support creativity are more likely to have higher satisfied employees who indicate lower intentions to leave the organisation (Mayfield & Mayfield,2007). In the case of South Africa, innovative work behaviour was established to lead to higher turnover intentions and not lower. This reemphasises the need for studies to be conducted and relationships to be investigated in different contexts to understand how the various relationships may differ when investigated in different contexts.

Thus, it is apparent that studies have established that an increase in innovative work behaviour result in a lower propensity to leave the organisation. The current study identified that an increase in innovative work behaviour results in greater propensity to leave the organisation. The rise in innovation does not assist in the reduction of turnover in Gauteng with a sample of continuous learners. Hence, it is imperative for various stakeholders to understand implement strategies to ensure that innovative employees are retained within an organisation.

Findings of this study contradict recent study that established innovative work behaviour to not influence the turnover intention of employees in Turkey (Eroğlu, Topçu, & Basım, 2018). Further studies did not find a relationship between innovative work behaviour and turnover intentions (Elmacı & Yalçın, 2012; Tongchaiprasit & Ariyabuddhiphongs, 2016). It is unclear in which contexts there is a relationship between innovative work behaviour and turnover intentions as two studies conducted in the same country differ in findings of the relationship between innovative work behaviour and turnover intentions when it was conducted in Turkey which may indicate that the relationship may differ according to the sample investigated (Eroğlu, Topçu, & Basım, 2018; Kesen, 2016).

Studies have previously focussed and investigated the positive effects that innovative work behaviour has on organisations but an important issue that requires exploration is the negative effects it may have that was unexplored (Shih & Susanto, 2011). As previously discussed, organisations today become reliant on employee innovation to achieve success, uniqueness and survival amongst competitors across industries (Abid, Zahra & Ahmed, 2015; Alsughayir, 2017; Lyon & Ferrier, 2002; Patterson, Kerrin, & Gatto-Roissard, 2009; Popa, Preda & Boldea, 2010; Tohidi & Jabbari, 2012; Salaman, & Storey, 2002; Shih & Susanto, 2011; Yuan & Woodman, 2010). Based on findings from the current study, the more innovative employees

become the more likely they are to desire to leave their employer. Findings bring light into the potential negative effects that innovative work behaviour can have to an organisation if not adequately managed. Furthermore, the need for information concerning how the identified negative effects can be buffered is offered in the study through the tests for mediation and moderation which will follow below.

5.5   RESEARCH QUESTION 2

To what extent does job satisfaction and perceived supervisor support mediate the relationship between innovativeness and turnover intentions among learners?

As previously discussed, this study has identified issues pertaining to the retention of innovative individuals and the costs associated with the loss of highly innovative employees. Therefore, it is important to gain understanding into ways that the effects may be buffered or alleviated.

H2: Perceived Supervisor Support mediates the relationship between individuals' innovation and turnover intentions amongst continuous learners.

According to Baloyi, Van Waveren & Chan (2014) mediators explain why or how a variable predicts or causes an outcome variable. Supervisor support was established as a mediator in various studies that have investigated different work outcomes (Baloyi, Van Waveren & Chan, 2014; Li, Castaño & Li, 2018; Zaitouni & Nassar, 2015).

According to Cropanzano and Mitchell (2005) established that the demonstration of support by supervisors towards employees results in a greater tendency for employees to be committed to their employers and in exchange result in lower turnover intentions amongst employees. This study emphasises the importance that perceived supervisor support has in retaining employees within organisations. Osman, Noordin, Daud and Othman (2016) established strong relationships to have a direct impact on the behaviours an attitude of employees towards their performance and lower turnover intentions.

Hypothesis 2 was supported. Therefore, perceived supervisor support does mediate the relationship between innovative work behaviour and turnover intentions. This finding supports findings by Firth, Mellor, Moore and Loquet (2004) propose that perceived supervisor support

can serve as a mediator in reducing the effect that stressors may have on employees' turnover intentions. Furthermore, perceived supervisor support was established to have a direct effect on turnover intentions, reported by various authors (Dhanpat, Modau, Lugisani, Mabojane & Phiri, 2018; Kalemci Tuzun and Arzu Kalemci 2012; Kalidass & Bahron, 2015; Newman, Thanacoody & Hui, 2011).

Kim, Lee and Lee (2013) claim that the reported relationships of perceived supervisor support may differ in a South African context. Based on findings, it can be stated that the relationship established in different contexts and in Western countries can be supported in a South African context.

According to Kottke and Sharafinski (1988), the beliefs employees have relating to the degree to which their supervisors are concerned about their well-being and provide them merit for their contributions can be regarded as supervisor support. Therefore, employees were established to feel a certain level of obligation towards their supervisors when perceive to have support and partake in paying back their supervisors in the act of helping supervisors reach their desired goal (Eisenberger, Stinglhamber, Vandenberghe, Sucharski & Rhoades, 2002). The perceived supervisor support was identified as critical in reciprocating employees towards the organisation.

When supervisory leadership is individuals oriented it has an influence on the level of satisfaction, commitment and the decision that employees make to either leave or remain with their employer (Mathieu, Fabi, Lacoursière & Raymond, 2016). As a result, the support received from supervisors in a work context can result in employees gaining a sense of belonging within an organisation and serve as a motivator for them to want to stay with their employer (Dhanpat at al., 2018). Therefore, supervisor support can change the direction of the innovative work behaviour and turnover intentions relationship and can serve to supress the negative effects innovative work behaviour may have on turnover intentions of employees.

H3: Job Satisfaction mediates the relationship between innovativeness of an individual' and turnover intentions amongst continuous learners.

Similarly, job satisfaction was established to be a mediator in the in the relationship between innovative work behaviour and turnover intentions of employees. A mediator is a variable that fully explains the relationship between the independent and dependent variable. It was established that the satisfaction of employees fully explains the relationship between innovative

work behaviour and turnover intentions. The effect of the innovative work behaviour did indeed correlate with job satisfaction. This is in alignment with various authors who have established job satisfaction to be a significant mediator in the relationships predicting turnover intentions of employees (Khawaldeh, Al Muala & Al Ziadat, 2014; Kuo, Lin, & Li, 2014; Saeed, 2014; Yin-Fah, Foon, Chee-Leong & Osman, 2010).

The level of satisfaction of an employee can serve as a determinant to whether they decide to stay or leave their employer. Job dissatisfaction was associated with higher levels of turnover intention as dissatisfied employees have a tendency to seek new employment opportunities whilst job satisfaction was associated with the opposite results as satisfied employees were established to have stronger commitment and desire to remain with their employers (Bysted, 2013; Foster, Lonial & Shastri, 2011; Hellman, 1997; Hom, Roberson & Ellis, 2008; Khawaldeh, Al Muala & Al Ziadat, 2014; Martin & Roodt, 2008; Saeed, 2014; Yin-Fah, Foon, Chee-Leong & Osman, 2010).

High job satisfaction was associated with a lower turnover intention amongst employees. Therefore, positive attitudes towards work is often associated with high levels of job satisfaction and dissatisfied employees often have negative attitudes towards their work (Chhabra, 2018; Han & Jekel, 2011; Mbah & Ikemefuna, 2012). Hence, it is imperative for job satisfaction to be considered amongst organisations as it may serve as the differentiating factor on whether an employee decides to remain or resign from their organisation.

According to Dockel, Basson, Coetzee (2006) the levels of satisfaction is vital in retaining employees, especially knowledge workers. As a result, job satisfaction was established as crucial in retaining employees; it can suppress the potential negative impacts that innovative work behaviour may have on turnover intentions. This highlights a need for the employment of strategies that foster employee job satisfaction in hopes to supress the negative effects and increase retention amongst employees.

5.6   RESEARCH QUESTION 3

To what extent do core self-evaluations influence turnover intentions among continuous learners?

H4: There is a significant association between core-self-evaluations and turnover intentions amongst continuous learners.

Core-self-evaluations were established to be amongst the most significant predictors of job satisfaction (Lemelle & Scielzo, 2012). According to the authors, core-self-evaluations provided researchers insight into how individuals view their worth and shown to be beneficial in the prediction of vital work outcomes.

This hypothesis was supported. Findings concur with findings of authors who have established core-self-evaluations to influence turnover intentions of employees as employees had lower levels of turnover intentions when they had high core-self-evaluations and had intentions to stay longer in their place of employment (Haynie, Harris & Flynn, 2016; Peterson, 2014). An inverse relationship was established in this study, lacking in a study by Greaves, Parker, Zacher and Jimmieson (2015).

Findings have established that the higher an employee's core-self-evaluations, the lower their turnover intentions. There is a negative relationship between core-self-evaluations and turnover intentions, which is supported by various authors (Albrecht, Paulus, Dilchert, Deller & Ones, 2013; Chang, Ferris, Johnson, Roosen & Tan, 2012; Joo, Hahn & Peterson, 2015; Rode, Judge, & Sun, 2012; Vîrga, De Witte & Cifre, 2017).

Haynie, Harris and Flynn (2016), established that individuals with high core-self-evaluations tend to have a positive perception of their work which translates into greater satisfaction with their jobs in comparison to those with low core-self-evaluations. As a result, employees that report high levels of core-self-evaluation have a stronger ability to deal with adversity experienced within a work context which leads them to think less of leaving their employer when compared to individuals who report low core-self-evaluation (Cadiz, 2010).

Findings support the current importance placed in today's economy for the need for employees that have a great amount to self -sufficiency, competent and capable and demonstrate a need to control their environment at work and advance themselves (Tims & Akkermans, 2017).

Javed *et al*. (2014) have reported there to be an absence of studies that focus on core-self-evaluations and the impact they have on an employee's turnover intentions. Findings of the current study are in alignment with literature that exists about the relationship. The established negative relationship supports and emphasises the importance of personality on critical vocational outcomes. The multi-faceted trait demonstrates that employee's subconscious evaluation of the various traits which include locus of control, self-efficacy, self -esteem and neuroticism influences their behaviours and perceptions and could show to have great benefit to both work and behaviour attitudes when levels are high.

5.7 RESEARCH QUESTION 4

To what extent do perceived distributive justice, core self-evaluations, experiential variables and type of work moderate the relationship between innovativeness and turnover intentions among continuous learners?

H5: Perceived distributive justice moderates the relationship between individuals' innovation and turnover intentions amongst continuous learners.

Distributive justice was not established to moderate the relationship between innovative work behaviour and turnover intentions. This finding contradicts Shih and Susanto (2011) who established distributive justice to be a negative moderator between innovative work behaviour and turnover intentions serving as a mitigating variable within the stated relationship.

The study established a negative direct relationship between distributive justice and turnover intentions of employees. This finding is supported by authors who established that turnover intentions amongst employees tend to decrease when distributive justice is high within an organisation (Aghaei, Moshiri & Shahrbanian, 2012; Brashear, Manolis & Brooks, 2005; Cohen-Charash & Spector, 2001; Nadiri & Tanova, 2010).

The consequences of low distributive justice include an employee's decision to resign as distributive justice impacts turnover intentions negatively (Hetidrix, Robbins, Miller &

Summers, 1999; Hom, Griffeth & Sellaro, 1984; Wong & Wong, 2017). This is in line with various studies who have established that distributive justice has great effects on employee's intention to stay within their organisations and job satisfaction levels amongst Hong Kong employees (Fields, Pang & Chiu, 2000).

Thus, distributive justice may serve to mitigate the desires employees have to leave their employer. This is supported by Birecikli, Alpkan, Ertürk and Aksoy (2016) who established distributive justice to mitigate the desire of creative employees to resign from their organisation. Distributive justice was established to be significantly concerning the commitment, satisfaction and turnover intentions in the context of East Asia (Li & Cropanzano (2009). Similarly, in the South African context distributive justice has also been established to be negatively associated to turnover intentions of employees within Gauteng.

As a result, this study has identified the perception that employees have concerning distributive justice was established to have an effect on retaining employees (Elçi, Şener, & Alpkan, 2011; Fields, Pang & Chiu, 2000; Hayes, 2015; Khan, Abbas, Gul & Raja, 2015; Loi, Hang-Yue & Foley, 2006). Therefore this study support the argument made by various authors who state that employees want their efforts to be fairly rewarded which will in return result in greater commitment to their employer and reduce their desire to seek opportunities elsewhere as they will be satisfied and reciprocate with involvement in their jobs (Birecikli, Alpkan, Ertürk & Aksoy, 2016; Khan, Abbas, Gul, & Raja, 2015). If there is a perception that the rewards are not distributed fairly, employees will have no desire to stay within the organisation. Therefore, perceptions of justice within the organisation provides employees a more positive outlook concerning their job (Birecikli, Alpkan, Ertürk & Aksoy, 2016; Shubaka, 2014).

Abu Elanain (2010), established that employees who report positive emotions regarding distributive justice were established to have greater levels of satisfaction with their job and have less propensity to resign attributable to an increase in commitment. As a result, distributive justice as a moderator may have not been supported in this study but the direct effects that it has on turnover intentions of employees cannot be overlooked as it is a variable that influences both the job satisfaction level of employees and turnover intentions.

H6: Core-self-evaluations moderate the relationship between individuals' innovation and turnover intentions amongst continuous learners.

Core-self-evaluation was not established to moderate the relationship between innovative work behaviour and turnover intentions. This finding contradicts authors who established core-self-evaluation to serve as a moderator in how an individual perceives their worth influences their reaction to events with ability of acting as a coping resource (Chang *et al.*, 2012; Haynie, Harris & Flynn, 2016; Harris, Harvey & Kacmar, 2009).

Core-self-evaluation was established to be significant in further statistical analysis in a moderated mediation test conducted. This study indicated significant influence of a fourth variable on the mediated relationship between innovative work behaviour and turnover intentions. Therefore, core-self-evaluations significantly moderated the relationship between innovative work behaviour and turnover intentions mediated by job satisfaction. Hence, this study uncovers a new direction of research in the established area of study in a possibility to investigate potential moderated mediation relationships.

In addition, this study also established a direct relationship between core-self-evaluations and turnover intentions of employees amongst employees in Gauteng. This study reveals that core-self-evaluations remains an important factor that organisations need to look into despite the lack of moderating effects on the predicted direct relationship, it still has direct influences on an individual's decision to leave the organisation and potential moderated mediation influences as established in the further analysis section.

H7: Age moderates the relationship between individuals' innovation and turnover intentions amongst continuous learners.

Age was not established to be a moderator in the relationship between innovative work behaviour and turnover intentions. This finding contradicts various authors who have established age to be a moderator in the prediction of turnover intentions (Cotton & Tuttle, 1986; Du Plooy & Roodt, 2013; Emiroğlu, Akova & Tanrıverdi, 2015; Igbaria & Guimaraes, 1993; Karatepe & Aleshinloye, 2009; Karatepe, Uludag, Menevis, Hadzimehmedagic & Baddar, 2006; Krecker, 1994). The current study supports the study conducted by Peltokorpi, Allen & Froese (2015) who established no moderating effects of age in the predication of turnover intention.

Although age was not established to be a significant moderator at a 5% significance level, this study supports age as a moderator at a 10% significance level. Therefore, with a p-value of 0.095 age was a significant moderator in the relationship between innovative work behaviour

and turnover intentions of employees. The 5% level of significance was criticised by various authors and regarded and authors have claimed that p-values tell little about studies and may be regarded as arbitrary (Amrhein, Korner-Nievergelt & Roth, 2017; Cohen, 2016). Therefore, according to the authors, there is still some evidence that larger p-values offer against the null hypothesis and because cannot be fully interpreted as supporting the null hypothesis which stipulates that there is no effect at all.

For this study will discuss and interpret the moderating effects that age was established to have on the direct relationship. Findings suggest that individuals with higher age report to have greater tendency to resign from their organisations in cases of both low and high innovative work behaviour when compared to individuals with lower age which contradicts many other findings.

Currently, studies concerning turnover intentions have reported younger employees to be more likely to resign and older employees were less likely to resign from their organisation (Hayes, 2015; Karlsson, 2008; Maheshwari, Patel & Bhinder, 2015; Óskarsdóttir, 2015; Tanova & Holtom, 2008). It was established that older employees are less open to change and unwilling to sacrifice formed relationships within the work context leading to the reduction of turnover intentions as an employee gets older (Perez, 2008). This study has established that concerning innovative work behaviour and turnover intentions, older employees have higher intentions to resign from their organisations. This initiates direction for further research concerning the function of age in innovation and turnover intentions in South Africa.

Despite the lack of support in the derived hypothesis in this study, age was established to be significant in further analysis conducted that established age to be significant in moderation mediation and in three-way interaction analysis. Concerning moderated mediation, age was further established to moderate perceived supervisor support and job satisfaction as mediators in the relationship between innovative work behaviour and turnover intentions. Furthermore, in the three-way interactions conducted, age was a established to influence tenure as a moderator in the relationship between innovative work behaviour and turnover intentions. Further investigation may be required to understand the function of age in further moderated relationships and in moderated mediation.

H8: Gender moderates the relationship between individuals' innovation and turnover intentions amongst continuous learners.

Gender was not established to moderate the relationship between innovative work behaviour and turnover intentions. This finding supports Du Plooy and Roodt (2013) who established no moderating effects on the relationship between work engagement, burnout and turnover intentions. Findings contract various authors who have established gender to be a moderator (Almer & Kaplan, 2002; Cotton & Tuttle, 1986; Emiroğlu, Akova & Tanrıverdi, 2015; Igbaria & Guimaraes, 1993; Karatepe *et al*., 2006; Maheshwari, Patel & Bhinder, 2015).

With a p-value of 0.061 gender was established to be a significant moderator in the relationship between innovative work behaviour and turnover intentions of employees. Findings in this study show that at low levels of innovative work behaviour, men have a greater propensity to resign from their organisations when compared to women. This finding supports a study by Dhanpat, Modau, Lugisani, Mabojane and Phiri (2018), who established male respondents to have greater levels of turnover intentions when compared to women. Also, the further statistical analysis indicates that there are significant differences between men and women in the direct relationship between innovative work behaviour and turnover intentions.

Furthermore, in three-way interaction analysis this study has shown that gender reported to be a significant moderator in the relationship of tenure as a moderator in the direct relationship of innovative work behaviour and turnover intentions. This study offers direction for future studies to observe the potential function of gender in more complex interactions such as the one of three-way interactions.

H9: Education moderates the relationship between individuals' innovation and turnover intentions amongst continuous learners.

Education was not established to moderate the relationship between innovative work behaviour and turnover intentions. This contradicts findings by authors that supported education as a moderator in the prediction of turnover intentions (Islam, Khan, Ahmas Ahmad & Ahmed, 2013; Jayasingam & Yong, 2013).

Findings support Du Plooy and Roodt (2013) a study conducted in the South African context who did not find education to be a moderator in the prediction of turnover intentions.

Despite no moderating effects being established in the study, further statistical analysis reveals that at different levels of education, the effect of core-self-evaluation on turnover intentions differs. Therefore, at low levels of education, the effect that core-self-evaluations has on turnover intentions is twice as much when compared to when there are higher levels of education reported. Also, the effect that perceived supervisor support had on turnover intentions differed at the various levels of education. Based on the results of the study, in cases of higher education, the greater the effect of perceived supervisor support on turnover intentions. A difference tests conducted in the further analysis section revealed that the positive relationship between TI and IWB is only significant when level of education is high. This finding supports Islam, Khan, Ahmas Ahmad and Ahmed (2013), establishing that individuals with higher levels of education, had a higher propensity to leave their employer. Further insight is provided into the function of education in various relationships investigated in the study.

H10: Tenure moderates the relationship between individuals' innovation and turnover intentions amongst continuous learners.

Tenure was not established to be a moderator in the relationship between innovative work behaviour and turnover intentions. This contradicts authors who have established different levels of tenure to change turnover intention relationships (Emiroğlu, Akova & Tanrıverdi, 2015; Karatepe *et al*., 2006; Krecker, 1994; Somers, 1996).

A direct relationship was established between tenure and turnover intentions which supports various studies that have reported tenure to influence turnover intentions of employees (Chan & Morrison, 2000; Karlsson, 2008; Maden, 2014; Óskarsdóttir, 2015; Perez, 2008). This study concurs with existing literature that tenure does have an influence on turnover intentions of employees.

Furthermore, further statistical analysis indicates that the effect that innovative work behaviour has on the job satisfaction of employees differ at different levels of tenure with a higher effect reported when tenure is low. Furthermore, differences tests show between turnover intentions and innovative work behaviour is only significant for low tenure.

Also, in three-way interaction analysis tenure reported to be significant in the moderation of age as a moderator in the direct relationship between innovative work behaviour and turnover intentions. Furthermore, tenure was also established to be significant in a three-way interaction conducted with gender as a moderator as women with low tenure reported to have greater

turnover intentions when compared to men with low tenure. Therefore, this opens direction for future studies to investigate tenure in more complex relationship as such of three-way interactions.

H11: Type of work moderates the relationship between individuals' innovation and turnover intentions amongst continuous learners.

Type of work was not established to be a moderator in the relationship between innovative work behaviour and turnover intentions. This contradicts findings by Humphrey, Nahrgang and Morgeson (2007) who indicate that employees with complex jobs have less tendency to quit their organisation, as job complexity was established to be concerning intrinsic motivation, job satisfaction and the extent to which knowledge workers are involved in their jobs.

During the further statistical analysis conducted, job complexity was established on the moderated mediation analysis conducted for job satisfaction as a mediator in the relationship between innovative work behaviour and turnover intentions. It may not have shown moderating effects on the direct relationship, but further analysis indicates potential relationships in moderation mediation analysis.

Therefore, based on findings, none of the moderating hypothesis were supported. It can be established that age, gender, education, tenure, job complexity and core-self-evaluations and distributive justice do not moderate the relationship between innovative work behaviour and turnover intentions at a 5% significance level. This contradicts the various studies that have established the various contextual variables to serve as a moderator in the relationship. This discussion has outlined and interpreted cases were some of the hypothesis can be supported at a 10% significance level.

Furthermore, age, gender, education and tenure were established in further statistical analysis to partake in either Three-way interactions or change the course of the relationship when exposed to either lower or higher levels of the investigated relationships. This study identifies a potential area of investigation in understanding the potential function of the variables in three-way interaction relationships.

5.8 CONCLUSION

This chapter has discussed the results that were obtained in Chapter 4. The chapter began with the discussion of the descriptive statistics which included the biographical profile of the sample. Also, the various hypothesis findings were discussed and compared to literature that currently exists relating to the various relationships and outline findings that were not in alignment with current literature.

The final chapter will comprise an overview of all the presented chapters and outline recommendations for future research, the contributions and implications the study has for both theory and practice and the limitations of the study.

CHAPTER 6

CONCLUSION AND RECOMMENDATIONS

6.1   INTRODUCTION

The previous chapter focusses on the discussion of the research questions and the hypotheses that were derived from them. The chapter discusses findings of the study in alignment with literature that currently exists concerning the topic.

This chapter focusses on providing an overview of the entire research process and emphasises developing important conclusions and recommendations that can be made based on this study and outline the limitations, recommendations for future research and the value of the study.

This following section provides an overview of the chapters presented in this study.

6.2   OVERVIEW OF THE CHAPTERS

6.2.1   Chapter 1

In a South African context, there is limited literature that has examined the potential effects of innovative work behaviour on turnover intentions of employees. Also, retaining employees as assets to organisations become an important area where organisations are hoping to gain more knowledge to avoid the loss of tacit knowledge. Therefore, Chapter 1 outlined the purpose of the study and research problem. The following sections were discussed within the chapter: background of research, research problem and purpose, research questions, significance of the study and the sequence of the chapters.

6.2.2   Chapter 2

An overview of the literature was presented in Chapter 2. The chapter placed emphasis on providing an overview of the literature pertaining to the key concepts in the study, namely turnover intentions, innovative work behaviour, job satisfaction, perceived supervisor support, distributive justice and core-self-evaluations.

Literature indicated the inconsistencies that exist concerning the various variables as there was no consensus regarding the relationships between the different variables. A need for further investigation was identified and research specifically in the South African context was deemed necessary.

6.2.3   Chapter 3

Chapter 3 presented the research design. The paradigmatic location of the research was discussed. Also based on the objective of the study, a quantitative approach was established to be most suitable for the research. Furthermore, the research methodology which formed the instrumentation of the study was outlined, followed by the data collection procedures used in this study. The research methodology continued with the presentation of concerns concerning the reliability, validity and common method bias and concluded with the discussion of the statistical analysis techniques that were to be used in the study.

6.2.4   Chapter 4

This chapter was focussed on the presentation of the data analysis results. It began with the presentation of the summary of the respondents in the study which included aspects related the percentage breakdown of the different categories which included age, race, gender, number of years in profession and company and highest qualification and job title in their workplace.

The second section of the study included the various steps followed in the analysis of the data with the use of SEM with the aim of answering the research questions and confirming or rejecting the derived hypothesis.

6.2.5   Chapter 5

This chapter discussed findings that were reported in Chapter 4. The chapter revisited current literature concerning the topic to understand which studies supported and aligned with findings of the current study. The contexts in which the various studies were conducted were observed endeavouring to aid in understanding the differences in findings. In this chapter the study hypotheses is reiterated, indicating which hypothesis were supported. Also, the results from further analysis were discussed.

6.3   ANSWERS TO RESEARCH QUESTIONS

The objective of the study was to test theory that relates all the various variables which include innovative work behaviour and turnover intentions and to test whether the various moderating and mediating factors as well as an individual's propensity to be innovative significantly predict an employee's turnover intention. Therefore, the main objective was to create insight through the process of testing to provide human resources professionals with recommendations specifically tailored to effectively manage retention of innovative individuals. Insights

considering the impact it may have on employees' turnover intentions may assist organisations in adequately managing their turnover rates.

The research questions derived from this objective are now presented and explained how they were each answered.

Research Question 1: To what extent does innovative work behaviour influence turnover intentions?

The results shown and discussed in previous chapters have shown that innovative work behaviour does have an influence on the turnover intentions of employees with a significant positive relationship established in the study. The results have demonstrated that for every one full standard deviation increase in innovative work behaviour would increase turnover intentions by .152, while holding all other variables constant. However, what remains unclear is the direction of the influence which warrants further studies as there is still contradictions as to whether innovative work behaviour influences the turnover intentions of employees negatively or positively.

Research Question 2: To what extent does job satisfaction and perceived supervisor support mediate the relationship between innovation and turnover intentions among learners?

With the use of specific indirect effects, this study has established that perceived supervisor support and job satisfaction mediate the relationship between innovative work behaviour and turnover intentions. This has been considered an important finding as the mediators could serve to be a solution in retaining innovative employees within organisations.

Research Question 3: To what extent do core self-evaluations influence turnover intentions among continuous learners?

The results shown and discussed in previous chapters have shown that core self-evaluations do have an influence on the turnover intentions of employees with a significant negative relationship established in the study. As a result, it can be established that one full standard deviation increase in CSE would decrease turnover intentions by .557, while holding all other variables constant.

This represents an important finding in this study as it depicts the strong effect that core self-evaluations have on the turnover intentions of an employee. Therefore, it is a crucial factor that organisations need to consider when formulating and designing policies to ensure that core self-evaluations is fostered within organisations.

Research Question 4: To what extent do perceived distributive justice, core self-evaluations, experiential variables and type of work moderate the relationship between innovativeness and turnover intentions amongst continuous learners?

With the use of product terms, this study has found that perceived distributive justice, core self-evaluations, experiential variables and type of work do not moderate the relationship between innovative work behaviour and turnover intentions amongst continuous learners at a 5% significance level. However, further statistical tests have established aforementioned variables are seen to influence the relationship in three-way interactions and moderated mediation analysis. Therefore, this warrants for further investigations.

6.4 IMPLICATIONS FOR THEORY

This study contributes to turnover intentions literature. Also, this study may serve to be important to researchers as this study supplements to the body of knowledge that exists concerning innovative work behaviour and turnover intentions through the evaluation of both moderating and mediating variables between the relationship. This study proved the mediating function of job satisfaction and turnover intentions in the relationship between innovative work behaviour and turnover intentions. This study proved the existing negative relationship between core-self-evaluations and turnover intentions.

This study integrated innovative work behaviour, job satisfaction, perceived supervisor support, core-self-evaluations, distributive justice and various demographic variables to explain turnover intentions within the South African context which is a theoretical contribution as minimal research was conducted in an African context that integrates the mentioned factors in one study.

6.5 IMPLICATIONS FOR PRACTICE

For organisations to grow and remain sustainable, it is imperative to retain employees and ensure that they are satisfied. Therefore, understanding the various factors that result in employee turnover is vital to ensure organisations survive.

The presented research has various practical implications to organisations and researchers. Findings will prove to be of value to current turnover intentions literature with the contribution to studies concerning a South African context. As discussed throughout the dissertation, the loss of employees has served to be costly to the organisation. It is imperative for organisations to continuously understand gain knowledge into the various way's employees can be retained.

Managers may require diverting their attention to their employees who demonstrate to have low core self-evaluations but who they wish to retain as they have been proved to have greater desires to leave their organisations. For employees that are entering new job positions, there is often personality tests conducted as a form of assessment to determine individual's suitability for the job. Therefore, seeing that core self-evaluations is a personality trait, it can be embedded in assessments that already exist that organisations use in the recruitment process. However, ultimately managers can take on the responsibility of creating a work environment that boosts the self-esteem of employees. Also, policies and practices can be implemented that will improve core self-evaluation levels amongst employees.

Also, managers may require diverting their attention to their employees who demonstrate to have low core-self-evaluations but who they wish to retain as they were proved to have greater desires to resign from their organisations. Furthermore, organisations may require the promotion of good relationships between their supervisors and employees to ensure adequate retention of innovative employees. This study has also emphasised the importance that lies in formulating policies and practices that foster job satisfaction amongst employees.

Furthermore, human resources practitioners need to ensure that a supportive work environment is built within organisations to ensure they can retain their employees. Therefore, further knowledge acquired relating to innovative work behaviour and turnover intentions will assist organisations in the design and formulation of policies and strategies that will enable them to retain their employees. Hence, work practices will need to incorporate factors that encourage job satisfaction in hopes to reduce turnover intentions of employees.

6.6   LIMITATIONS

Like any other study, this study comes with limitations which inherently limits the inferences that can be drawn from the study findings but can serve as a stepping stone for future studies in the research area.

The current study was restricted to participants who are currently employed in Gauteng, findings cannot be generalised to other geographical areas within South Africa as it is limited to the specific location and therefore there is a limitation on generalisability as Gauteng is only one of the nine provinces within South Africa. Therefore, in future studies can expand the research to be inclusive of all provinces making findings more generalisable.

Also, despite of the sampling technique used, the sample was not entirely representative of the demographics of the part-time working students as well as the population with majority of the participants being African and smaller number of other population groups. Therefore, limitations are posed in the researchers' ability to draw inferences from this study to match the South African population across various industries.

A major limitation of the research is its cross-sectional nature. Therefore, no causal relationships could be tested between innovative work behaviour and turnover intentions. A longitudinal study could further strengthen our conclusions and would create additional evidence for the nature of the relationships between innovative work behaviour and turnover intentions.

6.7 CONTRIBUTIONS OF THE STUDY

There are a few practical and theoretical contributions that will arise because of this study.

The contributions from a theoretical point of view are as follows:

- There was a call for more studies concerning turnover to be conducted in various contexts.
- Furthermore, this study has provided insight in the South African context concerning innovative work behaviour and turnover intentions whilst investigating both mediating and moderating variables.

From a practical point of view, the contributions are as follows:

- This study provides insight into innovative work behaviour and turnover intentions.
- This study has established various mediators in the relationship between innovative work behaviour and turnover intentions.
- Findings from this study may be of value to members of organisations worried about the levels of employee turnover that their companies may be facing. Findings may aid

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in formulating and implementing policies aimed at retaining employees. Therefore, sustainable policies and strategies can be formulated from findings from this study.

- This study emphasised the importance of job satisfaction and perceived supervisor support in the relationship between innovative work behaviour and turnover intentions. Human resources management professionals need to ensure policies and practices that foster job satisfaction within an organisation are facilitated and ensure that supervisors are encouraged to improve the supportive behaviours towards employees as they are perceived as a representative of the organisation and can contribute to the choice of an employee either leaving or staying with their organisation.

- Furthermore, initiatives can be facilitated by members of various organisations once there is more understanding of the various factors that influence the level of employee turnover experienced by organisations. There could be a reduction in the current growing rates of employee turnover.

- In addition, the study contributes to the developing body of research concerning innovative work behaviour and turnover intentions. The study confirms the effect that innovative work behaviour has on turnover intentions of employees.

6.8   FUTURE RESEARCH

Future studies may undertake the study qualitatively to aid in providing a deeper understanding of retaining employees across various industries and well as offering deeper insight into the reasoning behind employees' choices to leave their employers. Furthermore, future studies may investigate the potential relationships accounting for Three-way interactions, mediated moderation and moderated mediation. This study outlined the potential variables that may not be a moderator but serve as a moderator in a mediated relationship.

Also, future studies can conduct a comparative analysis to track the trends in the relationship over time and examine how they change once a learner completes his or her studies. Future studies may use an alumni sample to provide insight on the relationships of learners and how the relationship may change over time after learners have finished their studies.

6.9 CONCLUSION

In summary, this chapter outlined implications for both theory and practice as well as list the limitations of the study. The overall purpose of this study was to obtain further insight into the relationships discussed to enable organisations to formulate adequate strategies that catered for the effective retention of innovative employees and assist organisations in adequately managing innovativeness of an individual while adequately controlling the turnover intentions of employees.

The current study supported innovative work behaviour to influence the turnover intentions of employees. Furthermore, core self-evaluation was found to significantly affect the turnover intentions of employees with a negative relationship identified. However, no moderating effects were found from all the derived hypothesis for this study. On the other hand, this study supported perceived supervisor support and job satisfaction as mediators in the relationship between innovative work behaviour and turnover intentions. Furthermore, the present study has outlined the implications to both theory and practice and provided contributions from both a theoretical and practical point of view Therefore, organisations need to place emphasis on ways in which perceived supervisor support, job satisfaction and core self-evaluations can be fostered and enhanced in hopes to aid in the retention of employees.

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Appendix A - Participant information sheet

Participant Information Sheet

Title of Study: Innovativeness and turnover intentions amongst continuous learners in Gauteng

Good Day,

My name is Judite Adriano and I am a master's student in the Human Resources Management and Management Division at the University of the Witwatersrand, Johannesburg. I am conducting research on innovativeness and turnover intentions amongst learners. The study aims to identify how turnover intentions can be influenced by innovative work behaviour and how various variables have an influence in this relationship. Turnover intentions refer to when an employee intends to resign from their organisation.

You are **invited** to take part in this survey. As a learner, the purpose of this survey is to establish the relationship between innovation, turnover intentions and the extent to which innovation contributes to an employee's intention to quit. Findings from this study may aid organisations in managing innovation within organisations to ensure the adequate control of turnover intentions. You were selected for this study because as a continuous learner who is working and studying part-time, there is great value in broadening knowledge of how a continuous learner can be retained.

For participation in the study, participants are required to be at least 18 years of age with no maximum limit and need to be a part-time student that is currently employed.

Your participation will involve answering the attached questionnaire. Your response is important and there are no right or wrong answers. This survey is both confidential and anonymous. Anonymity and confidentiality are guaranteed by not needing to enter your name on the questionnaire. Your participation is completely voluntary and involves no risk, penalty, or loss of benefits whether or not you participate. You have the freedom to withdraw consent and discontinue your contribution in this study at any time without penalty. The results will not enclose your name and any other identifying data will be removed. The results from this study will be presented in my dissertation, in journals and made available in the world wide web.

The first part of the survey captures some demographic data. The second part of the survey comprises 60 statements. Please indicate the extent to which you agree with each statement. The entire survey should take between 25 to 35 minutes to complete. The survey was approved by the University's Ethics Committee Protocol Number: H18/06/01. If you have any queries, concerns or complaints regarding the ethical procedures of this study, you are welcome to contact the University Human Research Ethics Committee (non-medical), telephone + 27(0)11 717 1408, email hrec-medical.researchoffice@wits.ac.za/ Shaun.Schoeman@wits.ac.za.

Thank you for considering participating.

Yours Sincerely,

Judite Adriano

Researcher Contact: Judite Adriano - 1657077@students.wits.ac.za - 0727202980

Supervisor: Chris Callaghan - chris.callaghan@wits.ac.za - 0117178066.

Title of research project: Innovativeness and turnover intentions amongst part-time and ex part-time learners in Gauteng

Name of Researcher: Judite Adriano

I _____ agree to participate in this research project. The research has been explained to me and I understand what my participation will involve. I have read the information sheet and understand what my participation and had the opportunity to ask questions about them.

Please circle your response to the following:

I agree that my responses will remain anonymous	YES	NO
I agree that the researcher may use anonymous quotes in his research report	YES	NO
I agree that the information I provide may be used	YES	NO
anonymously by other researchers following this study		
I agree to my responses being used for education and research	YES	NO

on condition that my privacy is respected, subject to the following:

- I understand that my personal details will not be included in the research so that I will not be personally identifiable
- I understand that I am under no obligation to take part in this project.
- I understand I have the right to withdraw from this project at any stage.

SIGANATURE: _____

(*Participants are free to indicate with an 'X' should you feel you might be identified by your signature*)

DATE: _____

NAME OF PARTICIPANT: _____

Appendix C - Questionnaire

All information given will be treated as strictly confidential.

Section A

Please answer the questions below by placing a tick (✓) in the appropriate box.

1. What is your age? _____ (Yrs)

2. What is your gender? Male ☐ Female ☐ Other ☐ Prefer not to say ☐
3. Which industry do you work in? _____
4. How long in years have your worked for your current company? _____

5. How long in years have you worked in your current profession? _____

6. How many dependent children do you support? _____
    6.1 If you have children, do you head a single parent household? Yes ☐ No ☐

7. What is your marital status?

Single ☐ Married ☐ Separated ☐ Divorced/ Widowed ☐ Other ☐ Prefer not to ☐ say

8. To which population or ethnic group do you belong?

African ☐ Coloured ☐ White ☐ Indian ☐ Other ☐ Prefer not to say ☐

9. What type of work do you do? Full-time ☐ Part-time ☐

Briefly describe the nature of your job:

_____

10. Please indicate your highest qualification and as well as your parents.

	Matric Certificate	Certificate	Bachelor's Degree	Honours Degree	Master's Degree	PhD	Other
Yours							
Father							
Mother							

11. What degree/ certificate are you studying towards? _____

12. What is the reason for furthering your studies? Please tick more than one box if appropriate.

Promotion ☐ Personal ☐ Required by employer ☐ Other ☐ If other, please briefly explain_____

13. Which of the following most closely matches your job title?

Entry level ☐ Clerical/Administrative work ☐ Supervisor ☐ Owner of own business ☐

Partner in own business ☐   Director/Vice President/President/CEO ☐

Section B

The purpose of this section is to give you a chance to tell how you feel about your present job. Ask yourself: How satisfied am I with this aspect of my job? Please Indicate your answer with a (✓)	Very Dissatisfied	Dissatisfied	Neutral	Satisfied	Very satisfied
1. Being able to keep busy all the time.					
2. The chance to work alone on the job.					
3. The chance to do different things from time to time.					
4. The chance to be "somebody" in the community.					
5. The way my boss handles his/her workers.					
6. The competence of my supervisor in making decisions.					
7. Being able to do things that don't go against my principles.					
8. The way my job provides for steady employment					
9. The chance to do things for other people.					
10. The chance to tell people what to do.					
11. The chance to do something that makes use of my abilities.					
12. The way company policies are put into practice.					
13. My pay and the amount of work I do.					
14. The chances for advancement on this job.					
15. The freedom to use my own judgment.					
16. The chance to try my own methods of doing the job.					
17. The working conditions					
18. The way my co-workers get along with each other					
19. The praise I get for doing a good job					
20. The feeling of accomplishment I get from the job.					

Thinking about your current job, how often does each of the following statements describe how you feel? Please Indicate your answer with a (✓)	Strongly Disagree	Disagree	Neutral	Agree	Strongly Agree
21. I am confident I get the success I deserve in life.					
22. Sometimes I feel depressed					
23. When I try, I generally succeed.					
24. Sometimes when I fail I feel worthless.					
25. I complete tasks successfully					
26. Sometimes, I do not feel in control of my work					
27. Overall, I am satisfied with myself					
28. I am filled with doubts about my competence.					
29. I determine what will happen in my life.					
30. I do not feel in control of my success in my career.					
31. I am capable of coping with most of my problems.					
32. There are times when things look pretty bleak and hopeless to me					
33. The job requires that I only do one task or activity at a time.					
34. The tasks on the job are simple and uncomplicated					
35. The job comprises relatively uncomplicated tasks					
36. The job involves performing relatively simple tasks					

For the following scale please rate how much you agree with the following statements by ticking the appropriate number.	Never						Most of the times
37. How often have you considered leaving your current job?	1	2	3	4	5	6	7
38. How frequently do you scan newspapers and other platforms for job opportunities?	1	2	3	4	5	6	7
39. To what extent is your current job not addressing your important personal needs?	1	2	3	4	5	6	7
40. How often are opportunities to achieve your most important goals at work jeopardised?	1	2	3	4	5	6	7
41. How often are your most important personal values at work compromised?	1	2	3	4	5	6	7
42. How frequently are you day- dreaming about a different job that will suit your personal needs?	1	2	3	4	5	6	7

For the following scale please rate how much you agree with the following statements by ticking the appropriate number.	Never						Most of the times
43. What is the probability that you will leave your job, if you get another suitable offer?	1	2	3	4	5	6	7
44. How frequently do you look forward to another day at work?	1	2	3	4	5	6	7
45. How often do you think about starting your own business?	1	2	3	4	5	6	7
46. How often do family responsibilities prevent you from quitting?	1	2	3	4	5	6	7
47. How often do only vested personal interest (pension fund, unemployment fund, etc.) prevent you from quitting?	1	2	3	4	5	6	7
48. How frequently are you emotionally agitated when arriving home after work?	1	2	3	4	5	6	7
49. How often is your current job affecting on your personal well-being?	1	2	3	4	5	6	7
50. How often do the troubles associated with relocating, prevent you from quitting?	1	2	3	4	5	6	7

Indicate the extent you have felt this way over the past week.	Very slightly or not at all	A little	Moderately	Quite a bit	Extremely
51. Afraid					
52. Upset					
53. Nervous					
54. Scared					
55. Distressed					

Read each item and decide whether it is true or false for you.	True	False
56. No matter who I'm talking to, I'm always a good listener.		
57. There have been a few occasions when I took advantage of someone.		
58. I sometimes try to get even, rather than forgive and forget.		
59. When I don't know something, I don't at all mind admitting.		
60. There have been occasions when I felt like smashing things.		
61. I never resent being asked to return a favour.		
62. I have almost never felt the urge to tell someone off.		
63. I am sometimes irritated by people who ask favours of me.		
64. I sometimes think when people have a misfortune they only got what they deserved.		
65. I have never deliberately said something that hurt someone's feelings.		

Where do you stand in relation to the following statements? Please Indicate your answer with an (✓)	Strongly disagree	Disagree	Slightly disagree	Neutral	Slightly agree	Agree	Strongly agree
66. I take ideas to my boss because he or she deals with them effectively							
67. My supervisor is open and fair when I submit an idea							
68. My supervisor listens carefully to what I say when I bring in an idea							
69. My supervisor is willing to support me when I have a valuable idea							
70. My supervisor handles my ideas promptly							
71. My supervisor takes action in pursuance of my ideas we discussed.							
72. My supervisor gives high priority to handling my ideas.							

For the following scale please rate how much you agree with the following statements by ticking the appropriate number.	Never						Most of the times
73. My work schedule is fair							
74. I think that my level of pay is fair							
75. I consider my work load to be quite fair							
76. Overall, the rewards I receive here is quite fair							
77. I feel that my job responsibilities are fair							

Thinking about your current job, how often does each of the following statements describe how you feel? Please Indicate your answer with a (✓)	Very strongly agree	Strongly Disagree	Disagree	Neutral	Agree	Strongly Agree	Very strongly agree
78. I create new ideas for difficult issues.							
79. I make important organizational members enthusiastic for innovative ideas.							
80. I mobilize support for innovative ideas.							
81. I transform innovative ideas into useful applications.							
82. I search out new working methods, techniques, or instruments.							
83. I introduce innovative ideas into the work environment in a systematic way.							
84. I evaluate the utility of innovative ideas.							
85. I acquire approval for innovative ideas.							
86. I generate original solutions for problems.							

Thank you for completing the questionnaire and for taking time out to participate.

Appendix D - Ethics clearance certificate

Research Office

HUMAN RESEARCH ETHICS COMMITTEE (NON-MEDICAL)
R14/49   Adriano

CLEARANCE CERTIFICATE   PROTOCOL NUMBER: H18/06/01

PROJECT TITLE   Innovativeness and turnover intentions amongst part-time and ex part-time learners in Gauteng

INVESTIGATOR(S)   Miss J Adriano

SCHOOL/DEPARTMENT   Economic and Business Sciences/

DATE CONSIDERED   22 June 2018

DECISION OF THE COMMITTEE   Approved

EXPIRY DATE   08 July 2021

DATE   09 July 2018   **CHAIRPERSON**   (Professor J Knight)

cc: Supervisor : Professor C Callaghan

DECLARATION OF INVESTIGATOR(S)

To be completed in duplicate and **ONE COPY** returned to the Secretary at Room 10004, 10th Floor, Senate House, University. Unreported changes to the application may invalidate the clearance given by the HREC (Non-Medical)

I/We fully understand the conditions under which I am/we are authorized to carry out the abovementioned research and I/we guarantee to ensure compliance with these conditions. Should any departure to be contemplated from the research procedure as approved I/we undertake to resubmit the protocol to the Committee. <u>i agree to completion of a yearly progress report.</u>
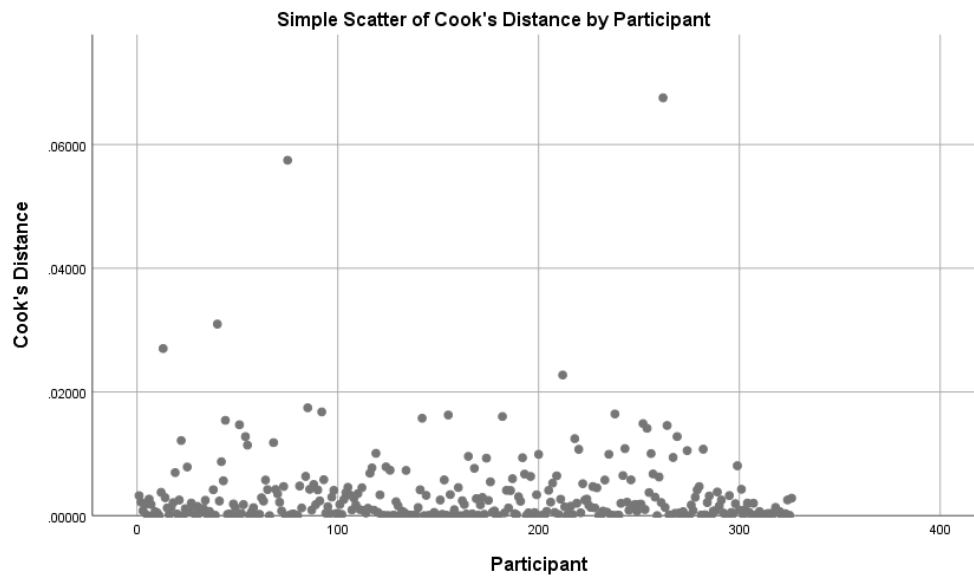
Signature   Date 10 / 07 / 18

PLEASE QUOTE THE PROTOCOL NUMBER ON ALL ENQUIRIES

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Appendix E - Multivariate assumptions

Based on the figures, it can be established that there were not many alarming outliers when Cooks Distance of all variables on the dependent variables was evaluated.

Simple Scatter of Cook's Distance by Participant

Appendix F - Summary of literature and methodology

<table>
<tr><td colspan="5">INNOVATIVE WORK BEHAVIOUR</td></tr>
<tr>
<td>Studies</td>
<td>Tested Relationships</td>
<td>Context-Sample Type-Country</td>
<td>Main Findings</td>
<td>Research Gap</td>
</tr>
<tr>
<td>Lance (1988)</td>
<td>Innovative Work Behaviour and Turnover Intention; Job Satisfaction</td>
<td>United States</td>
<td>

Strong negative correlations between satisfaction and turnover intentions
Employees have a stronger tendency to have turnover intentions if they perform better than other employees.

</td>
<td>Authors recommended future studies to look at the moderating and mediating roles that certain constructs have on the established relationship which is in alignment with what this study hopes to investigate.</td>
</tr>
<tr>
<td>Shih & Susanto (2011)</td>
<td>Innovative Work Behaviour and Turnover Intention</td>
<td>Indonesia</td>
<td>

Innovative work behaviour had significant relationship with turnover intention.

</td>
<td>No mediation was studied in the relationship and as well as the study was based in Taiwan lacking the South African context. The authors have recommended that future research should look into other industries and locations as well as explore other contextual variables that could potentially buffer the negative impacts of innovative work behaviour on turnover intention that were established.

Therefore, this study provides the opportunity for all those recommendations to be investigated.</td>
</tr>
<tr>
<td>Stradinger (2016)</td>
<td>Innovative Work Behaviour and</td>
<td>United States</td>
<td>

Employees who participate in innovativeness are

</td>
<td>These findings contribute to the inconsistencies that exist as to the role that</td>
</tr>
</table>

INNOVATIVE WORK BEHAVIOUR				
	Turnover Intention		less likely to quit.	innovativeness plays in an employee's turnover intentions and whether there is a positive or negative outcome. Therefore, this study will investigate how innovativeness impacts an employee's turnover intentions and whether it is positive or negative in a South African context.
Kesen (2016)	Innovative Work Behaviour and Turnover Intention	Turkey	• It was found that innovation had a significant power for decreasing turnover	Innovativeness was studied as a mediator rather than independent variable. No moderation was included as well as the fact that findings are based in Turkey and not in a South African Context.
Eroğlu, Topçu, & Basım (2018)	Innovative Work Behaviour and Turnover Intention	Turkey	• There was no significant effect of innovative work behaviour on turnover intentions.	The findings added to the lack of clarity that exists on the relationship between innovativeness and turnover intention which highlights the need for more studies to be conducted around the topic to be able to have a clear understanding on the relationship. Also, no mediation or moderation was included as well as the fact that findings are based in the public sector in Turkey and not in a South African Context.
Mizrahi (2018).	Turnover intentions, innovative work behaviour, creative	USA, creative professionals,	• Creative climate and leader-member exchange directly predicted lower turnover intention	This study did not include moderating and mediating variables and was based in a Western context.

INNOVATIVE WORK BEHAVIOUR				
	climate, leader-member exchange and intrinsic and extrinsic motivation			
Bhatnagar (2012).	Turnover intentions, innovation, psychological empowerment, work engagement	India, managers, industrial sectors	• Employees that psychologically empowered are more engaged and more are likely to relate to high innovation processes and demonstrate lower turnover intentions.	The study called for future studies to examine moderators and mediators of the relationship in future studies.
Mayfield & Mayfield, (2007)	Creativity, job satisfaction, turnover intention	United States, graduate and undergraduate students	• Organisations that support creativity are more likely to have higher satisfied employees who indicate lower intentions to leave the organisation	The findings are those of a Western context.
Shalley, Gilson & Blum (2000).	Creativity, job satisfaction, turnover intentions	United states	• Organisations that support creativity are more likely to have higher satisfied employees who indicate lower intentions to leave the organisation • A strong relationship was found between participation in creative activities and the turnover	Conducted in a Western context, looked at creativity and not innovative work behaviour which covers the implementation and execution of ideas.

INNOVATIVE WORK BEHAVIOUR				
			intentions of employees	
Li, Duverger & Yu (2018).	Pre-quitting behaviour, creativity	China, Hotel employees	• Higher levels of creativity were associated with an increase in pre-quitting behaviours	Conducted in Asian context and focused on hospitality industry employees and therefore did not account for other industries.
Demircioglu (2017)	Innovation, turnover	United States	• Innovation can reduce the turnover intentions and increase the satisfaction and commitment levels of employees	Based on a Western context did not account for mediation and moderation.
Robinson & Beesley, (2010).	Creativity, intent to leave	Australia, Chefs	• The more creative chefs had a stronger intent to leave their organisation	Focused on chefs and did not account for any other career field. Therefore, knowledge is required in relation to other professions and how the relationships differ in the different work context.
Tongchaiprasit & Ariyabuddhiphongs, (2016).	Creativity, turnover intentions, job stress, job satisfaction	Thailand, chefs	• No significant relationship was found between creativity and turnover intentions in Bangkok	No moderating effects were investigated. Focused on chefs and did not account for any other career field. Therefore, knowledge is required in relation to other professions and how the relationships differ in the different work context.
Lin (2016)	Innovation Atmosphere, Organizational Commitment, Turnover Intention, Cultural	China	• Organisation promoting an innovative atmosphere can contribute positively to their employee's	Asian context did not look into other contextual factors and how they may influence the relationship.

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INNOVATIVE WORK BEHAVIOUR				
	Enterprises		intention to remain within the organisation. • Negative correlation was found between innovative atmosphere and intention to leave an organisation.	
Wang & Ma (2013)	Innovation, turnover intentions	Salespeople, United States	• Climates for innovation were found to influence the turnover intentions of employees;	Based on the sample of salespeople, did not include individuals from other fields, conducted in the US which means the findings are based on a Western context and could differ in an African context.
Eriksson, Qin & Wang (2014)	Innovation, HRM Practices, Employee Turnover	China, high-tech industries	• A curvilinear relationship was found between innovation and the turnover of employees	The study was narrowed to a specific industry and did not consider other industries and how the relationships may be in a different work context.
Müller & Peters (2010)	Innovation, turnover of employees	Germany	• A curvilinear relationship was also found between innovation and the turnover of employees	The study was based in Germany whose outcomes may differ compared to an African context.
Ettlie (1985)	Innovation, turnover		• Found a direct and negative association between turnover and innovation	
Price (1977)	Turnover, innovation		• Found a direct and negative association	

INNOVATIVE WORK BEHAVIOUR				
			between turnover and innovation	
Elmacı & Yalçın, (2012).		Turkey, intermediate and upper level managers in the companies	• No association was found between innovation power and turnover	The study sampled intermediate and upper level managers and did not account for individuals with other job titles that are just as important for the organisation to be able to succeed.

PERCEIVED SUPERVISOR SUPPORT

PERCEIVED SUPERVISOR SUPPORT				
Studies- Authors	**Tested Relationships**	**Context- Sample Type- Country**	**Main Findings**	**Research Gap**
Shih & Susanto (2011)	Turnover Intention; Distributive Fairness	Indonesia	• Perceived distributive justice moderated the relationship between innovative work behaviour and turnover intention.	No mediation was studied in the relationship and as well as the study was based in Taiwan lacking the South African context. The authors have recommended that future research should look into other industries and locations as well as explore other contextual variables that could potentially buffer the negative impacts of innovative work behaviour on turnover intention that were established.

PERCEIVED SUPERVISOR SUPPORT				
				Therefore, this study provides the opportunity for all those recommendations to be investigated.
Wang & Ma (2013)	Innovation, turnover intentions	Salespeople, United States	• Relationship with supervisors were found to influence the turnover intentions of employees;	Based on the sample of salespeople, did not include individuals from other fields, conducted in the US which means the findings are based on a Western context and could differ in an African context.
Shalley, Zhou & Oldham (2004)	Innovative Work Behaviour; Supervisor Support	United States	• This systematic review found that majority of the studies relating to innovativeness came from the US or other Western nations. • The authors identified theoretical and empirical work has proposed that individuals that come from Non-Western countries may react differently to organisational conditions when compared to Western countries.	The review recommends studying intrinsic motivation as a mediator in future research which this study offers the opportunity to uncover, through its investigation of job satisfaction with intrinsic motivation as a sub-construct. Also, there is a recommendation for research in an international context which this research will contribute to through its investigation using South Africa.

PERCEIVED SUPERVISOR SUPPORT				
Stradinger (2016)	Turnover Intention; Supervisor Relationship	United States	• A relationship was found between the innovativeness of an employee and the kind of supervisor relationship they have.	These findings contribute to the inconsistencies that exist as to the role that innovativeness plays in an employee's turnover intentions and whether there is a positive or negative outcome. Therefore, this study will investigate how innovativeness impacts an employee's turnover intentions and whether it is positive or negative in a South African context.
Yanchus, Periard & Osatuke (2017).	Turnover intention, supervisor support and job satisfaction	N- 2432 registered nurses, 3769 social workers 2520 psychologists, 1276 psychiatrists, United States	• Supervisory support positively related to job satisfaction • Supervisory support negatively related to turnover intention.	There were no mediating or moderating variables in the study. The study is based on a Western context and may differ in an African context.
Kim, Lee & Lee (2013).	Turnover intentions and the effects of supervisor and co-worker relationships	N=824, administrative office workers, China and Korea	• Supervisor relationship had a negative linear association with turnover intentions • Co-worker relationship had a negative and linear association with turnover intentions.	Study was investigated in an Asian context; there were no moderating and mediating variables that were included in the study.

PERCEIVED SUPERVISOR SUPPORT				
Vîrga, De Witte & Cifre (2017)	Turnover intentions, core self evaluations, job resources, supervisor support and health	N=274, blue-collar employees, Italy (Rome)	• Supervisor support is negatively correlated with turnover intentions.	This study was based in Europe and the outcome could be different in an African context. There was no mediation and moderation analysis conducted.
Mizrahi (2018).	Turnover intentions, innovative work behaviour, creative climate, leader-member exchange and intrinsic and extrinsic motivation	N= 720 creative professionals, USA	• Creative climate and leader-member exchange directly predicted lower turnover intention	This study did not include moderating and mediating variables and was based in a Western context.
Firth, Mellor, Moore and Loquet (2004)	Intent to quit, stressors, supervisors	Australia, retail sales people	• The support from supervisors can serve as a mediator when it comes reducing the effect that stressors have on an employee's turnover intentions.	Focused on retail sales people and did not investigate other contextual variables such as the demographic factor and distributive justice as well as the possible moderating and mediating effects.
Nijenhuis (2015).	Innovative work behaviour, turnover	Netherlands, public sector	• Found that employees that demonstrate quality relationships with their supervisors have a greater tendency to show innovative work behaviour in an organisation and boost their confidence on the outcomes that	The study focused on the public sector for the sample. However, insight into the private sector employees is also imperative.

PERCEIVED SUPERVISOR SUPPORT				
			being innovative may derive	
Mathieu, Fabi, Lacoursière & Raymond (2016).	leadership, supervisory behaviour, turnover intentions, job satisfaction, organizational commitment	Canada, private (manufacturing, retailing and services) and public sectors (health and social services).	• Supervisors with leadership that was people oriented were showed to influence how employees were satisfied, committed to the organisation and essentially their decisions to either remain with their employer or leave	Conducted in Canada and did not account for possible mediating and moderating variables that may exist.
Yanchus, Periard & Osatuke (2017).	Supervisor support, job satisfaction, turnover intentions	Mental health employees	• supervisory support was found to play a critical role in the determination of the levels of job satisfaction and turnover intentions of employees	Focused on mental health employees, did not account for other career fields, therefore the relationships need to be understood in different contexts.
Baer (2012)	Creativity, idea implementation	United States, large global agricultural processing firm.	• The implementation of ideas often requires effort and motivation which involves the establishment of relationships or strong bonds	The study was specific to the agricultural industry and was based in a Western context.
George & Zhou (2007)	Supervisor support, fairness, creativity	United States, oil field services company	• Environment is supplied by supervisors through fairness	The study was based in the US and was specific to the oil field services and did not

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PERCEIVED SUPERVISOR SUPPORT				
			and feedback with employees, there is an occurrence of more creativity within work environments	account for the relationships across industries.
Dhanpat, Modau, Lugisani, Mabojane and Phiri (2018)	Retention, intent to leave, supervisor support	South Africa, Call centre employees	• The support provided to employees by their supervisors decreases the stress encountered on the job and could produce a sense of belonging which could supply individuals with adequate reasons to remain with their employer.	The study focused on call centre employees and did not include employees from other industries. Also, potential moderators and mediators were not investigated.
Kalidass & Bahron (2015)	perceived organizational support, perceived supervisor support, organizational commitment, employees' turnover intention	Malaysia, middle level management to low level employees.	• Perceived Support has also been regarded as backbone in certain industries in efforts to reduce turnover intentions among their staff and has been found to have a negative relationship with turnover intentions	Focused on a specific level of management and was based in Malaysia, the outcome of relationships may differ
Newman, Thanacoody & Hui (2011).	Perceived Organizational Support, Perceived Supervisor Support	China, service sector	• Perceived Support has also been regarded as backbone in certain industries	Was based in an Asian context and focused solely on the service sector, therefore it is important to

PERCEIVED SUPERVISOR SUPPORT				
	and Intra-Organizational Network Resources on Turnover Intentions		in efforts to reduce turnover intentions among their staff and has been found to have a negative relationship with turnover intentions	understand the dynamics of the relationships in different contexts.
Zhou (2003).	Supervisor support, creativity, fairness	United States, different sectors	• Supportive environment is supplied by supervisors through fairness and feedback with employees, there is an occurrence of more creativity within work environments	This study was based in a Western context.

JOB SATISFACTION

JOB SATISFACTION				
Studies- Authors	**Tested Relationships**	**Context- Sample Type- Country**	**Main Findings**	**Research Gap**
Odom, Boxx & Dunn (1990)	Innovative Culture and Job Satisfaction	N/A	It was found that an innovative culture within the organisation increased the commitment and job satisfaction levels among employees.	Did not look into turnover intentions to moderating or mediating roles of the variables and did not look into innovativeness as a variable rather the culture.

JOB SATISFACTION				
Saeed, Waseem, Sikander & Rizwan (2014)	Turnover Intention and Job Satisfaction	N=166, upper and lower level employees, Pakistan	Job satisfaction and turnover intention have a negative relationship that is significant	As intentions vary across different societies and economies, the findings may differ in a South African context. No Mediation or Moderation analysis.
Khawaldeh, Muala & Al Ziadat (2014)	Turnover intention, job satisfaction and organizational commitment.	N=150, employees in communications, Jordan	Job satisfaction has significant impact on turnover intention	Studies were encouraged to look at other companies and industries apart from communications. The study did not include mediation or moderation tests.
Yin-Fah, Foon, Chee-Leong & Osman (2010).	Turnover Intention and Job Satisfaction.	N=120, private sector employees, Malaysia	A negative relationship between Job Satisfaction and Turnover Intention.	A wider population and larger sample size could assist in the generalisability of the outcome. Looking into moderating and mediating variables on the relationship.
Feng, Su, Yang, Xia & Su (2017)	Turnover intention, social status and job satisfaction as a mediator	N=581, nurses China	There was a significant indirect effect exerted by social status on turnover intentions via job satisfaction.	Recommendation for future studies to investigate other variables that may have an effect on turnover intentions. No potential moderating variables were tested.
Johnson & Yanson (2015)	Turnover Intentions, job	N=52 employees	There was a negative relation between both job	The sample size was small, there were no

	satisfaction, user involvement, core self-evaluations, computer self-efficacy and employee stress		stress and turnover intentions on turnover intentions.	moderating or mediating variables considered in the study.
Kuo, Lin & Li (2014).	Turnover, job stress and mediating effects of job satisfaction	N=173, nurses, Taiwan	The relationship between work stress and turnover intentions was significantly mediated by job satisfaction.	The sample was based on nurses and not employees across various fields and requires a further investigation to determine if the relationship is the same across fields and countries.
Tsai & Wu (2010).	Turnover intention, organisational citizenship behaviour and job satisfaction	N=237, clinical nurses, Taiwan	Nurses' job satisfaction is positively correlated with organisational citizenship behaviour Nurses job satisfaction is negatively correlated with turnover intentions.	This study was not in a South African context. There were no mediating or moderating variables investigated. The sample was specifically nurses.
Han & Jekel (2011).	Turnover intentions, leader-member exchange, job satisfaction as a mediator.	N=197, nurses, US	- Negative relation between job satisfaction and turnover intentions. - A mediating effect of job satisfaction between LMX and turnover intentions.	This study focused on nurses and no other sample. This study was based in the US and the outcome can potentially be different in an African context.

JOB SATISFACTION		214		
Tongchaiprasit & Ariyabuddhiphongs (2016).	Turnover intention, creativity, job satisfaction and stress.	N=145, chefs, Thailand	• Turnover intention was not predicted by creativity. • Job satisfaction was not found to be an independent. • Mediator of the creativity-turnover intention relationship.	This study did not investigate possible moderating and mediating variables that could have an impact on the relationship. This study was based merely on chefs and does not account for employees in other fields.
Cavanagh & Coffin (1992)	Job satisfaction and turnover	Female nurses, United States	• Job satisfaction was found to be the most significant and important predictor of turnover	
Karlsson (2008)	Job satisfaction and turnover	Sweden, young engineers two Swedish companies	• Job satisfaction was found to be the most significant and important predictor of turnover	
Martin, 2008).	Job satisfaction, turnover	South Africa	• Job satisfaction was found to be the most significant and important predictor of turnover • Employees have a stronger tendency to leave their jobs	

			when they are less satisfied.	
Shields and Ward's (2001)	Intent to quit, job satisfaction	England, nurses	• Lower job satisfaction increases the employees' intention to quit.	
Özbağ and Ceyhun (2014)	Job Satisfaction, Work-Family Conflict and Turnover	Turkey, Turkish Marine Pilots	• Higher levels of job satisfaction were associated with lower levels of turnover intention which contradicts other studies which found a significant relationship.	
Khawaldeh, Al Muala & Al Ziadat, 2014;	Job satisfaction, turnover	Jordan, registration department	• Job satisfaction was found to directly impact turnover intentions negatively, employees who are not satisfied are more likely to intend to quit their work	
Saeed, Waseem, Sikander & Rizwan (2014)	Job satisfaction, turnover intentions	Pakistan	• Job satisfaction was found to directly impact turnover intentions negatively, employees who are not satisfied are more likely	

JOB SATISFACTION				
			to intend to quit their work	
Yin-Fah, Foon, Chee-Leong & Osman (2010).	Job satisfaction turnover intentions		• Job satisfaction was found to directly impact turnover intentions negatively, employees who are not satisfied are more likely to intend to quit their work	
Mosadeghrad, Ferlie and Rosenberg (2008)	job satisfaction, organizational commitment and turnover intention	Iran, hospital employees	• Job satisfaction to significantly predict an employee's intention to leave.	
Martin and Roodt (2008),	organisational commitment, job satisfaction and turnover intentions i	South Africa, academic/research, support and administrative personnel.	• The greater satisfaction employees' experience the less likely employees would think about leaving the organisation due to the stronger organisational commitment.	
Jacobs & Roodt,(2008)	Organisational Commitment, job satisfaction, turnover intentions	South African tertiary institution	• A negative relationship was found between job satisfaction and employees' intention to quit	

JOB SATISFACTION			217	
			in a study conducted among nurses	
Foster, Lonial & Shastri (2011).	Job satisfaction, turnover intentions	Canada, CMAS employees	• Dissatisfied employees have been found to show higher turnover intentions than employees who were satisfied and as a result have a greater chance of seeking new employment opportunities because dissatisfaction results in thoughts of quitting	
Hellman (1997)	Job satisfaction, turnover intentions		• Dissatisfied employees have been found to show higher turnover intentions than employees who were satisfied and as a result have a greater chance of seeking new employment opportunities because dissatisfaction results in	

JOB SATISFACTION 218				
			thoughts of quitting	
Hom, Roberson & Ellis, 2008	turnover, performance, gender, race	United states,	• Dissatisfied employees have been found to show higher turnover intentions than employees who were satisfied and as a result have a greater chance of seeking new employment opportunities because dissatisfaction results in thoughts of quitting	
Bysted (2013)	innovative employee behaviour: The moderating effects of mental involvement and job satisfaction	Denmark, finance industry	• Employees who are satisfied have a greater intention to remain in their organisations	
Verdiesen (2015)	Job satisfaction, innovative work behaviour	Netherlands, defence organisation	• Found no significant effect of job satisfaction on innovative work behaviour	
Raiser (2016)	Job satisfaction, innovative work behaviour	Germany, Frontline hospitality employees	• Found job satisfaction to lead to employees' reciprocation	

JOB SATISFACTION			219	
			through endorsing innovation in the workplace	
Attiq, Wahid, Javaid, Kanwal & Shah (2017)	Innovative work behaviour, core self-evaluation, supportive work environment, management support, co-worker support	Pakistan, NGOs, banking, and telecom sector	• Job satisfaction to lead to employees' reciprocation through endorsing innovation in the workplace	

CORE SELF-EVALUATIONS

CORE SELF-EVALUATIONS				
Studies- Authors	**Tested Relationships**	**Context- Sample Type- Country**	**Main Findings**	**Research Gap**
Joo, Hahn & Peterson (2015)	Turnover intention, core self-evaluations	N=291, knowledge workers, South Korea	• Employees with high core self-evaluations ere more satisfied and intended to stay longer.	Study recommended looking at Non-Western contexts. No Mediation or Moderation.
Johnson & Yanson (2015)	Turnover Intentions, job satisfaction, user involvement, core self-evaluations, computer self-efficacy and employee stress	N=52 employees	There was a negative relation between both job stress and turnover intentions on turnover intentions.	The sample size was small, there were no moderating or mediating variables considered in the study.

CORE SELF-EVALUATIONS				
Karatepe & Azar (2013).	Turnover intentions, core self-evaluations as a moderator, work–family conflict, family–work conflict on turnover intentions	N=141, employees in the four- and five-star hotels, Iran	Core self-evaluations strengthen the negative effects of work–family facilitation and family–work facilitation on turnover intentions.	Mediating variables were not investigated, and the study focused on a specific industry and did not look into other industries that could have had a different result.
Vîrga, De Witte & Cifre (2017)	Turnover intentions, core self-evaluations, job resources, supervisor support and health	N=274, blue-collar employees, Italy (Rome)	• Core self-evaluation is negatively related to turnover intentions. Supervisor support is negatively correlated with turnover intentions.	This study was based in Europe and the outcome could be different in an African context. There was no mediation and moderation analysis conducted.
Greaves, Parker, Zacher and Jimmieson (2015)	core self-evaluations, supervisor support, turnover intentions, employed informal caregivers, resource interactions	Australia, United States, India	• Found no inverse relationship between core self-evaluations and turnover intentions.	
Haynie, Harris and Flynn (2016)	Job attitudes, Change uncertainty, Core self-evaluations	Banking sector, United States	• High core self-evaluations have been related to low turnover intentions as individuals will think less of leaving their employer when faced with changes and challenges within the organisation when compared to individuals	

			that have low core self-evaluations who will tend to leave their organisation when faced with similar challenges	
Chang et al. (2012)	Core self-evaluation		• Core self-evaluation may serve as a moderator between the relationship of variables as how an individual perceives their worth influences their reaction to events.	
Javed, Abrar, Bashir & Shabir, (2014)	Perception of Organizational Politics, Core Self-Evaluation, Turnover Intentions.	Pakistan health sector	• The moderating effects of core self-evaluations on turnover intentions were found in a research that was carried out in Pakistan	
Albrecht, Paulus, Dilchert, Deller & Ones (2013)	Core- self-evaluations	Germany, vocational school students specializing on commerce, (2) army soldiers, (3) university students majoring in business psychology, (4)	• A negative relationship was found between core self-evaluations and turnover intentions	

CORE SELF-EVALUATIONS				
		university students with diverse majors, and (5) employees from different hierarchical levels of a German logistics company.		
Joo, Hahn & Peterson (2015)	Core self-evaluation		• Found a negative relationship between core self-evaluations and turnover intentions among employees • Employees intended to stay in an organisation longer when demonstrated high levels of core self-evaluations • Found that employees with higher core-evaluations were more likely to remain within their organisations and show greater levels of satisfaction with their conditions at work.	
Rode, Judge, & Sun (2012)	Core self-evaluation, turnover intentions	United States, production and	• Found a negative relationship	

CORE SELF-EVALUATIONS				
		distribution centre employees	between core self-evaluations and turnover intentions among employees	
Vîrga, De Witte & Cifre, 2017			• Found a negative relationship between core self-evaluations and turnover intentions among employees	
Dörner (2012)	Innovative work behaviour, job performance, employee expectations	Germany	• Found that employees with high self-efficacy have greater confidence when it comes to innovative activities and are more likely to participate in innovative behaviour	
Chang, Ferris, Johnson, Roosen and Tan (2012),	Core self-evaluations		• Found a negative relationship between core self-evaluations and turnover intentions	

DISTRIBUTIVE FAIRNESS

DISTRIBUTIVE FAIRNESS				
Studies- Authors	**Tested Relationships**	**Context- Sample Type- Country**	**Main Findings**	**Research Gap**

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DISTRIBUTIVE FAIRNESS				
Hetidrix, Robbins, Miller & Summers (1999)	Distributive justice, turnover intentions	United States, Two textile products plants	• The consequences of low distributive justice include an employee's decision to leave their employer as distributive justice impacts turnover intentions negatively	
Hom, Griffeth & Sellaro (1984)	Distributive justice, turnover intentions	United states	• Employee's decision to leave their employer as distributive justice impacts turnover intentions negatively	
Wong & Wong (2017)	Distributive justice and turnover intentions		• Distributive justice impacts turnover intentions negatively	
Kim & Lee (2013)	co-worker satisfaction; Korean HRM and turnover intention; leader member exchange	Korea and China administrative office workers	• A positive relation was found between organisational justice and innovative behaviours	
Suliman (2013)	Organisational justice, innovative behaviours	UAE, top, middle and bottom levels of management	• Positive relation was found between organisational justice and	

DISTRIBUTIVE FAIRNESS				
			innovative behaviours	
Wojtczuk-Turek & Turek (2013)	Organisational justice, innovative behaviours	Poland	• Positive relation was found between organisational justice and innovative behaviours	
Anderson, De Dreu and Nijstad (2004)	Innovation research, distributive unfairness	Netherlands,	• Found that employees who experience distributive unfairness are reluctant to engage in innovative behaviour.	
Fields, Pang & Chiu (2000).	Job satisfaction, distributive justice, intent to stay	Japan, full-time employees working 35 hours or more per week for an employer, Japan	• Distributive fairness was found to have great effects on their intention to stay as well as job satisfaction levels among Hong Kong employees	
Akram, Haider & Feng (2016)	Distributive fairness, job satisfaction, innovativeness	China, telecommunication sector	• Who found that distributive fairness will increase job satisfaction as well as the innovativeness of employees	
Gozukara & Yildirim (2016)	Distributive justice, innovative behaviour, mediator,	Turkey, Aviation sector	• Who found that distributive fairness will	

DISTRIBUTIVE FAIRNESS				
	organizational learning		increase job satisfaction as well as the innovativeness of employees	
Momeni, Ebrahimpour & Ajirloo, 2014	Distributive justice, job satisfaction, innovativeness	Iran, Social Security Organization employees	• Who found that distributive fairness will increase job satisfaction as well as the innovativeness of employees	
Shih & Susanto (2011)	Distributive fairness, job satisfaction, innovative work behaviour, turnover intention	Indonesia	• Distributive fairness will increase job satisfaction as well as the innovativeness of employees • Distributive fairness was found to buffer the desire of creative employees to leave their organisation	
Almansour and Minai (2012)	Organizational Justice, innovative Behaviour, Distributive Justice, Procedural Justice, interactional Justice	Jordan, managerial staff	• Found no relationship between innovative work behaviour and distributive fairness in a	
Birecikli, Alpkan, Ertürk & Aksoy, (2016)	Justice Perceptions, Need	Turkey, white-collar employees of three high-tech firms	• Distributive fairness was found to buffer the desire of	

DISTRIBUTIVE FAIRNESS				
	for Independence, Affective Commitment, Turnover Intentions		creative employees to leave their organisation	
Nadiri & Tanova (2010).	Distributive justice, turnover intentions	Cyprus, hotel industry employees	• Negative relationship between distributive justice and turnover intentions was found as turnover intentions tended to decrease when distributive justice was high within an organisation	
Cohen-Charash & Spector (2001).	Distributive justice, turnover intentions	United States	• Distributive justice was found to have a negative relationship with turnover intentions along with the other dimensions of organisational justice	
Brashear, Manolis & Brooks (2005)	Sales force; Justice; Turnover; Trust; Control	Salespeople, United States	Who found a negative association between distributive justice and turnover intentions.	
Cropanzano and Greenberg (1997)	Job satisfaction, commitment, turnover intentions		• Unfair processes within an organisation produce negative consequences	

DISTRIBUTIVE FAIRNESS				
			such as turnover and low levels of satisfaction and commitment.	
Aghaei, Moshiri and Shahrbanian (2012)	Distributive justice, turnover intention	Iran, Sports industry	• Significant negative relationship between distributive justice and turnover intention	
Elçi, Şener, & Alpkan (2011)	Distributive justice, retention	manufacturing, service and trade organizations Turkey	• The perception that employees have in relation to distributive fairness has been found to have a serious effect on the retention of employees	
Li and Cropanzano (2009)	Distributive justice, commitment, job satisfaction, turnover intentions		• Perceptions of distributive justice had significant relations with the commitment, turnover intentions and job satisfaction of employees in the context of East Asia.	
Loi, Hang-Yue & Foley, 2006).	Organisational support, turnover intention, organisational commitment,	China, Law firm solicitors	• The perception that employees have in relation to distributive fairness has been found to have a serious effect on	

DISTRIBUTIVE FAIRNESS				
	employee justice perceptions		• The retention of employees	
Khan, Abbas, Gul & Raja, 2015	Organizational justice Islamic work ethic Turnover intentions, Job satisfaction, Job involvement	Pakistan, management staff	• The perception that employees have in relation to distributive fairness has been found to have a serious effect on the retention of employees	
Fields, Pang & Chiu (2000)	Distributive justice, retention		• The perception that employees have in relation to distributive fairness has been found to have a serious effect on the retention of employees	

Demographic Factors

DEMOGRAPHIC FACTORS AND JOB COMPLEXITY				
Studies- Authors	**Tested Relationships**	**Context- Sample Type- Country**	**Main Findings**	**Research Gap**
Joo, Hahn & Peterson (2015)	Turnover intention, core self-evaluation, job complexity and demographic variables	N=291, knowledge workers, South Korea	• Demographic variables (i.e. gender, age, education levels significantly predicted turnover intention). • Employees with	Study recommended looking at Non-Western contexts. No Mediation or Moderation.

DEMOGRAPHIC FACTORS AND JOB COMPLEXITY				
			high core self-evaluations ere more satisfied and intended to stay longer. Individuals with complex jobs were less likely to quit.	
Chan & Morrison (2000)	Turnover intention, retention, and demographic, work-related factors	N=120, Registered Nurses in a major hospital in Singapore	• Employees with longer years of nursing experience were more likely to stay. • Nurses who liked their jobs were most likely to stay and the nurses who did not like their jobs were most likely to leave.	Data was collected from one hospital and did not include moderating and mediating variables.
Emiroğlu, Akova & Tanrıverdi (2015).	Turnover intentions, demographic factors and the factors such as tenure.	N= 297, hotel managers, Turkey	• Turnover intentions are determined by age, gender, marital status, education, and tenure.	The study did not look at the demographic variables in correlation with other contextual factors and did not test for moderation and Mediation. The sample was based on managers and not on other employees.
Ongori (2007).	Demographic factors, turnover intentions	Botswana	• Education, age, tenure and gender have been found to be	

DEMOGRAPHIC FACTORS AND JOB COMPLEXITY				
			associated with turnover intentions	
Liu et al., (2018).	Education level, years of experience, age, professional titles, turnover intention	Nurses, China	• Turnover intentions were found to significantly report different scores among nurses on characteristics such as educational level, years of experience, age, and professional titles	
Van Breukelen, Van der Vlist and Steensma (2004),	Age, tenure, turnover	Netherlands, navy	• The age and tenure of individuals has often been used as moderators and predictors in studies relating to the turnover of employees.	
Krecker (1994)	Age, turnover intentions		• Age as a moderator in the prediction of turnover intentions	
Karatepe & Aleshinloye, 2009	Age, turnover intentions	Nigeria, hospitality employees	• Found age as a moderator in the prediction of turnover intentions	

DEMOGRAPHIC FACTORS AND JOB COMPLEXITY				
Hayes (2015),	Demographic factors, turnover intentions	United States,	• Found a significant relationship between the age of employees and their intent to leave • Found no statistically significant relationship between gender, tenure and education in the prediction of turnover intentions.	
Perez (2008)	Age, turnover intentions		• Age was found to be negatively related to turnover intention with an indication that intend to quit reduces as an employee gets older.	
Almer & Kaplan ((2002)	Gender, turnover intentions		• Moderating effects of gender in the prediction of turnover intentions	
Maheshwari, Patel & Bhinder (2015).	Gender, turnover intentions	India	• Found moderating effects of gender in the prediction of turnover intentions	

DEMOGRAPHIC FACTORS AND JOB COMPLEXITY				
Cotton & Tuttle (1986)	Gender, age, turnover intentions		• Found moderating effects of gender in the prediction of turnover intentions • Found age as a moderator in the prediction of turnover intentions	
Joseph, Ng, Koh & Ang 2007;	Gender, turnover intention,	Singapore, Information Technology Professionals	• Found no significant relationship between gender and turnover intention	
Martin & Roodt 2008;	organisational commitment, job satisfaction and turnover intentions i	South Africa, academic/research, support and administrative personnel	• Found no significant relationship between gender and turnover intention	
Porter, Steers, Mowday, & Boulian (1974).	Gender, turnover intention		• No significant relationship between gender and turnover intention	
Peltokorpi, Allen and Froese (2015),	Organizational embeddedness, turnover intentions, and voluntary turnover: The moderating effects of employee demographic characteristic	Japan	• Gender assisted the explanation of the association that exists between embeddedness and turnover intentions as a weaker relationship was	

DEMOGRAPHIC FACTORS AND JOB COMPLEXITY				
			found for women.	
Dhanpat, Modau, Lugisani, Mabojane and Phiri (2018),	Gender, turnover intentions		• Male respondents were found to have greater levels of turnover intentions when compared to women.	
Maheshwari, Patel & Bhinder (2015)	Education levels, turnover intention, tenure	India	• Education levels of employees have an influence their decision to either stay or leave their organisation • An employee's tenure in an organisation has been constantly associated with retention and in a study the authors conducted, it was established that employees at different levels of tenure had different turnover intentions perceptions	
Jayasingam and Yong (2013)	affective organizational commitment; career	Malaysia,	• Employees with university degrees has a less likelihood of	

DEMOGRAPHIC FACTORS AND JOB COMPLEXITY				
	management; knowledge work; mentoring relationship; pay satisfaction		leaving the organisation	
Islam, Khan, Ahmas and Ahmed (2013),	Leadership, Employee turnover, Learning	Banking sector, Malaysia	• Found a different result as individuals with higher levels of education were found to have a higher propensity to leave their employer. However, in a study	
Du Plooy and Roodt (2013)	Demographic variables, turnover intentions	South Africa	• Education levels were not found as a moderator on the relationship between work engagement, burnout and turnover intentions • On gender found no moderating effects on the relationship between work engagement, burnout and turnover intentions • Found age as a moderator in the prediction of	

DEMOGRAPHIC FACTORS AND JOB COMPLEXITY				
			turnover intentions	
Igbaria & Guimaraes (1993).	Gender, age, turnover intentions		• Found moderating effects of gender in the prediction of turnover intentions • Found age as a moderator in the prediction of turnover intentions	
Bester (2012)	Education levels, turnover intentions	South Africa	• Found education levels to influence turnover intentions	
Cavanagh and Coffin (1992)	Education levels, turnover	Female nurses, United States	• Indication of higher turnover rates for nurses that had a higher level of education.	
Volk & Lucas, 1991).	Education levels, turnover		• Education levels were found to not influence an employee's decision to either stay or quit their jobs	
Karatepe,, Uludag, Menevis, Hadzimehmedagic & Baddar (2006).	Tenure, turnover intentions, gender, age	Cyprus, frontline employees	• Employees that were longer tenured had a stronger tendency to stay in an organisation and	

			• employees with short tenure demonstrated higher levels of turnover intention • That found moderating effects of gender in the prediction of turnover intentions • found age as a moderator in the prediction of turnover intentions	
Emiroğlu, Akova & Tanrıverdi, 2015;	Turnover intentions, age, gender, education levels	Turkey	• Employees that were longer tenured had a stronger tendency to stay in an organisation and employees with short tenure demonstrated higher levels of turnover intention • Found education levels to influence turnover intentions • Found moderating effects of gender in the prediction of turnover intentions	

DEMOGRAPHIC FACTORS AND JOB COMPLEXITY				
			• Age as a moderator in the prediction of turnover intentions	
Krecker, 1994	Tenure, turnover intentions		• Employees that were longer tenured had a stronger tendency to stay in an organisation and employees with short tenure demonstrated higher levels of turnover intention	
Somers (1996)	Employee withdrawal behaviour	Nurses, united states	• Employees that were longer tenured had a stronger tendency to stay in an organisation and employees with short tenure demonstrated higher levels of turnover intention	
Avery, McKay, Wilson, Volpone & Killham (2011).	Tenure, turnover intentions	United Kingdom, United States	• Length of tenure was found to be a moderator between employee voice and turnover intentions	

DEMOGRAPHIC FACTORS AND JOB COMPLEXITY				
Maden (2014)	job matching, job involvement, tenure, employee satisfaction, turnover intention	Turkey banks and one logistics company	• Employees with a long length of tenure are hesitant to leave their employer due to the collection of organisational investments.	
Óskarsdóttir (2015)	Tenure, turnover intentions	Iceland, ere employees working in education and child-care, special needs education or as head of department	• Individuals with longer tenure had less propensity to leave their employers because of their investment to the organisation along the years • Younger employees were found to have stronger propensity to leave their organisations compared to other employees.	
Chan & Morrison (2000).	Tenure, turnover, retention	Singapore, nurses	• Found that nurses with longer tenure were more likely to stay in their place of employment	
Karlsson (2008).	Tenure, age and turnover intentions	young engineers two Swedish companies	• Longer tenure was associated with a less likelihood of intending to	

DEMOGRAPHIC FACTORS AND JOB COMPLEXITY				
			leave the organisation when compared to individuals with shorter tenure • Older employees were less likely to intend to leave their employers when compared to younger employees in the engineering industry.	
Perez (2008)	Tenure, turnover intention	Switzerland	• The longer an employee is with an employer the less likely they are to desire to leave the organisation	
Woods, Mustafa, Anderson & Sayer (2018).	Tenure, innovative work behaviour, personality traits	United Kingdom, financial institution	• Effects of tenure have been found in relation to innovative work behaviour and personality traits as employees were found to generate more ideas if they had a longer tenure	
Humphrey, Nahrgang and Morgeson (2007)	Job complexity, turnover intentions		• Found that employees with complex jobs have less tendency to quit	

DEMOGRAPHIC FACTORS AND JOB COMPLEXITY				
			their organisation	

METHODOLOGY

Authors	Sample Size	Statistical Analysis
Aghaei, Moshiri and Shahrbanian (2012)	180	Stepwise multiple regression
Akram, Haider & Feng, 2016	235 employees	Correlation and multiple regression analysis.
Albrecht, Paulus, Dilchert, Deller & Ones, 2013	791	Correlations
Almansour and Minai (2012)	175	Correlations
Almer & Kaplan, 2002;	173	MANCOVA
Anderson, De Dreu and Nijstad (2004)	-	Critical Review
Attiq, Wahid, Javaid, Kanwal & Shah, 2017	251	SEM
Avery, McKay, Wilson, Volpone & Killham, 2011	1,006(UK); 1002(US)	hierarchical moderated multiple regression
Baer, 2012	238 c	the regression analyses.
Bester 2012;	644	SEM and Regression
Bhatnagar (2012).	291	f structural equation model

Authors	Sample Size	Statistical Analysis
Birecikli, Alpkan, Ertürk & Aksoy, 2016	155	Regression Analysis
Brashear, Manolis & Brooks (2005),	240	SEM
Cavanagh & Coffin, 1992	221	Structural modelling
Chan & Morrison (2000)	120	-
Chang, Ferris, Johnson, Roosen and Tan (2012),	15 years of CSE theory	Meta-Analysis
Cohen-Charash & Spector, 2001	64,757 participants	Meta-Analysis
Cotton & Tuttle, 1986	-	Meta-Analysis- Stepwise regression
Cropanzano and Greenberg (1997)	-	Literature Review
Demircioglu (2017)		
Dhanpat, Modau, Lugisani, Mabojane and Phiri (2018)	282	t-tests
Dörner (2012)	422	SEM
Du Plooy and Roodt (2013)	2429	Multiple Regression
Elçi, Şener, & Alpkan, 2011	715	Correlation and regression analyses
Elmacı & Yalçın, 2012	15 companies	-
Emiroğlu, Akova & Tanrıverdi (2015).	297	t-test and ANOVA test
Eriksson, Qin & Wang, 2014	582 companies. T	-
Eroğlu, Topçu, & Basım (2018)	186	SEM
Ettlie, 1985	56 firms	
Feng, Su, Yang, Xia & Su (2017)	581	bootstrapping analysis, bootstrapping analysis

Authors	Sample Size	Statistical Analysis
Fields, Pang & Chiu, 2000	887	hierarchical regressions
Firth, Mellor, Moore and Loquet (2004)	173	Path Analysis
Foster, Lonial & Shastri, 2011	235	SEM
George & Zhou, 2007	188	hierarchical moderated regression
Gozukara & Yildirim; 2016	400	SEM
Greaves, Parker, Zacher and Jimmieson (2015)	57 employees from Australia (Study 1) and 66 United States and India (Study 2)	Hierarchical Multiple Regression
Han & Jekel (2011).	197	multivariate linear regressions.
Hayes (2015)	187	Multiple Regression
Haynie, Harris & Flynn, 2016	398	multiple linear regression w
Hellman, 1997		
Hetidrix, Robbins, Miller & Summers, 1999	310 full-time employees	Confirmatory and exploratory path analyses
Hom, Griffeth & Sellaro, 1984	192	Hierarchical regression analyses, Path Analysis
Hom, Roberson & Ellis, 2008	475,458 professionals and managers,	Hierarchical Linear Modeling Models
Humphrey, Nahrgang and Morgeson (2007)	259 studies	Meta-analysis
Igbaria & Guimaraes, 1993		
Islam, Khan, Ahmas and Ahmed (2013),	415	SEM
Jacobs & Roodt, 2008	367	SEM, ANOVA, Stepwise regression

Authors	Sample Size	Statistical Analysis
Javed, Abrar, Bashir & Shabir, 2014	100	Multiple linear regression
Jayasingam and Yong (2013)	350	hierarchical regression analysis
Johnson & Yanson (2015)	52	-
Joo, Hahn & Peterson (2015)	291	hierarchical multiple regression
Joseph, Ng, Koh & Ang 2007	33 studies	SEM
Kalidass & Bahron, 2015	260	Regression
Karatepe & Aleshinloye, 2009	159	Hierarchical multiple regression analyses
Karatepe & Azar (2013).	141	hierarchical multiple regression analysis
Karatepe et al., 2006	460	Path Analysis
Karlsson, 2008	67	multiple regressions
Kesen (2016)	239	sequential regression analyses.
Khan, Abbas, Gul & Raja, 2015	182	Multiple linear regression analysis w
Khawaldeh, Muala & Al Ziadat (2014)	150	SEM
Kim & Lee, 2013	824	regression analyses
Kim, Lee & Lee (2013).	824	hierarchical regression analysis.
Krecker, 1994	1277	Logistic Regression
Kuo, Lin & Li (2014).	173	Multistage linear regression
Lance (1988)	1750	Correlations, regression
Li and Cropanzano (2009)	-	Review of Literature
Li, Duverger & Yu, 2018).	85 supervisors and 249	Regression

Authors	Sample Size	Statistical Analysis
Lin (2016),	356	SEM
Liu et al., 2018).	1761	linear regression analysis
Loi, Hang-Yue & Foley, (2006).	514	hierarchical regression analyses
Maden (2014),	252	hierarchical regression analysis
Maheshwari, Patel and Bhinder (2015	401	ANOVA test
Martin & Roodt 2008;	2279	structural equation modelling and stepwise linear regression
Martin, 2008	367	Stepwise linear regression and SEM
Mathieu, Fabi, Lacoursière & Raymond, 2016).	763	SEM
Mayfield & Mayfield, 2007	134	SEM
Mizrahi (2018).	720	structural equation modeling.
Momeni, Ebrahimpour & Ajirloo, 2014	500	multiple regression
Mosadeghrad, Ferlie and Rosenberg (2008)	629	logistic regression analysis, t-tests
Müller & Peters, 2010	1,576 firms	bivariate probit regressions
Nadiri & Tanova, 2010).	208	Hierarchical regression
Newman, Thanacoody & Hui, 2011).	437	SEM
Nijenhuis (2015).	5	Coding
Odom, Boxx & Dunn (1990)	387	One-way ANOVA
Ongori, 2007).	-	Review
Óskarsdóttir, 2015).	155	One-way ANOVA and t-tests

Authors	Sample Size	Statistical Analysis
Özbağ and Ceyhun (2014),	100	Hierarchical Regression Analyses
Peltokorpi, Allen and Froese (2015)	643	Regression Analysis
Perez (2008)	1366	Regression Analysis
Porter, Steers, Mowday, & Boulian, 1974).	30	t-tests
Price, 1977	-	Review
Raiser, 2016		
Robinson & Beesley, 2010).	746	t-tests
Rode, Judge, & Sun, 2012;	281	Regression
Saeed, Waseem, Sikander & Rizwan (2014)	166	Linear Regression Analysis
Shalley, C. E., Zhou, J., & Oldham, G. R. (2004)	-	Systematic Literature review
Shalley, Gilson & Blum, 2000).	2200	Regression
Shields and Ward's study (2001)	9625	
Shih & Susanto (2011	460	multiple hierarchical regressions
Somers, 1996)	244	OLS and logistic regressions
Stradinger (2016)	99	Survival Analysis
Suliman, 2013;	875	Regression
Bysted (2013)	294	confirmatory factor analysis and hierarchical regression models.
Tongchaiprasit & Ariyabuddhiphongs (2016).	145	Regression analysis was used via the PASW18 program with the PROCESS program
Tsai & Wu (2010)	237	Pearson's correlation, One-way analysis of variance

Authors	Sample Size	Statistical Analysis
Van Breukelen, Van der Vlist and Steensma (2004),	202	Logistic regression analyses
Verdiesen (2015)	160	Hierarchical regression analyses
Vîrga, De Witte & Cifre (2017)	274	hierarchical multiple regressions
Volk & Lucas, 1991		
Wang & Ma, 2013	210	SEM
Wojtczuk-Turek & Turek, 2013	201	Regression Analysis
Wong & Wong, 2017		
Woods, Mustafa, Anderson & Sayer, 2018	146	Hierarchical regression analyses
Yanchus, Periard & Osatuke (2017).	N- 2432 registered nurses, 3769 social workers 2520 psychologists, 1276 psychiatrists,	structural equation modelling techniques for model testing.
Yin-Fah, Foon, Chee-Leong & Osman (2010).	120	Pearson Moment Correlation
Zhou, 2003	25 (study 1) 123 (study 2)	Regression, multiple regression tests

APPENDIX FROM SAMPLE TEST

The research selected half of the total sample randomly and conducted the analysis once again to determine if there would be any changes in the outcome derived with the use of the entire sample. Below is the outcome of the analysis conducted.

	Structural Paths		Final Model	
			Estimate	P
JS	<---	IWB	,369	***
PSS	<---	IWB	,420	***
TI	<---	IWB	,238	,013
TI	<---	JS	-,200	,020
TI	<---	PSS	-,569	***
TI	<---	CSE	-,336	,003
TI	<---	PNS	,172	,072

Model Fit Indices	Recommended Guidelines	Values Obtained
RMSEA	<0.08	0,067
CMIN/d.f	Maximum Limit of 5	1,738
NFI	≥ 0.95	0.809
TLI	≥0.95	0,897
CFI	≥.90	0,908
GFI	≥ 0.95	0,770
AGFI	≥0.90	0,729

From the tables above, it can be established that the model fit was not as good as the reported fit measures with the entire sample, this could be as a reason of a small sample to make of SEM as half of the sample accounted for less than 200 respondents. Although there was a fluctuation in the p-values of the different variables the variables still reported a significant relationship to turnover intentions excluding the positive and negative affect variable not significant.