A STUDY ON THE RELATIONSHIPS BETWEEN INDIVIDUAL AND ORGANISATION CAREER MANAGEMENT PRACTICES TOWARD ACADEMICS' CAREER SUCCESS

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By

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ABSTRACT

A STUDY ON THE RELATIONSHIP BETWEEN INDIVIDUAL AND ORGANISATION CAREER MANAGEMENT PRACTICES TOWARD ACADEMICS' CAREER SUCCESS

Tee Poh Kiong

The private higher education sector in Malaysia has grown tremendously, but a huge decline has been observed in its number of academic staff members. This issue has drawn considerable attention from the industry and the government, who have raised concerns about academics' career status, particularly their career opportunities and success. This research sought to investigate academics' career success factors by taking a more convergent view of the impact of both individual and organisational factors through the lens of contemporary career management. The mediating role of perceived employability was examined in this relationship by distinguishing between perceptions of internal and external employability. Data from 288 academics in Malaysian private universities was collected and analysed using Partial Least Squares Structural Equation Modeling (PLS-SEM). The findings revealed that a protean career attitude has no significant direct influence on career success; rather, it has an indirect effect on career success via perceived internal and external employability. Organisational learning practices have a significant direct and indirect influence on career success. Both internal and external perceived employability mediate the effects of a protean career attitude

and organisational learning practices on career success, with perceived external employability having a stronger direct and mediating effect on academics' career success. This study uncovers that Malaysian academic staff depend upon external employment opportunities to pursue success in academia. Since perceived external employability has the greatest impact on academics' career success, universities should retain their academics and remove them from the external labour market by focusing on the learning and development strategies that bind employees to the organisation. The results are particularly meaningful for stakeholders in the higher education sector in relation to the effective management of academic staff to create a sustainable advantage in the age of the internationalisation and commercialisation of the higher education industry. The implications of the findings are discussed along with the study's limitations and future research directions.

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APPROVAL SHEET

This dissertation/thesis entitled "<u>A STUDY ON THE RELATIONSHIP</u> <u>BETWEEN INDIVIDUAL AND ORGANISATION CAREER</u> <u>MANAGEMENT PRACTICES TOWARD ACADEMICS' CAREER</u> <u>SUCCESS</u>" was prepared by TEE POH KIONG and submitted as partial fulfillment of the requirements for the Doctor of Philosophy in Management at Universiti Tunku Abdul Rahman.

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DECLARATION

I hereby declare that the dissertation is based on my original work except for quotations and citations which have been duly acknowledged. I also declare that it has not been previously or concurrently submitted for any other degree at UTAR or other institutions.

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LIST OF ABBREVIATIONS

11MP	Eleventh Malaysia Plan
AVE	Avearage Variance Extracted
CB-SEM	Covariance-based Structural Equation Model
DLOQ	Dimensions of Learning Organisation Questionnaire
DOPU	Drop-off and Pick-up
НСМ	Hierarchical Component Model
HEIs	Higher Education Institutions
HTMT	Heterotrait-Monotrait Criterion
ICM	Individualistic Career Management
MEBHE	Malaysia Education Blueprint of Higher Education
MQA	Malaysia Qualification Agency
MYRA	Malaysia Research Assessment Instrument
NKEA	National Key Economic Areas
OCM	Organsational Career Management
OLP	Organisational Learning Practices
РВСО	Protean and Boundaryless Career Orientation
PCA	Protean Career Attitude
PEE	Perceived External Employability
PEMANDU	Performance Management and Delivery Unit
PHEIs	Private Higher Education Institutions

PIE	Perceived Internal Employability
PLS-SEM	Partial Least Squares Structural Equation Modeling
SCCT	Social Cognitive Career Theory
SCCT-CSM	Career Self-Management Model
SEM	Structural Equation Modeling
SPES	Self-Perceived Employability Scale
VAF	Variance Accounted For
VIF	Variance Inflation Factor

CHAPTER 1

INTRODUCTION

1.1 Introduction

Recognising the shift from the industrial-based economy to a knowledgebased economy in tandem with the emergence of the Fourth Industrial Revolution (4.0 I.R), industrial modernisation has demanded greater flexibility and adaptability on the part of organisations and employees (Ahmad, Shamsuddin, & Abu Seman, 2018; Hirschi, 2018; Pereira & Romero, 2017). As stated by Johannessen (2019), the nature of work has changed dramatically, resulting in much precariousness in the workplace. With technological advancement and increasing environmental uncertainty, the nature of work and careers has indeed become more fluid and unpredictable, making the entire employment environment more volatile with a high level of ambiguity concerning career expectations and developments (Chuang & Graham, 2018; Hofstetter & Rosenbiatt, 2017). The traditional perspective of career success measured by hierarchical progression is now uncertain and insecure due to the utter demise of bureaucratic and managerial layers. Moreover, the employment relationship has shifted from careers that offer 'long-term' secure employment to careers that provide 'lifelong' employability (Akkermans, Tim, Beijer, & De Cuyper, 2019; Van Harten et al., 2020). In such scenarios,

employability is considered an alternative to job security, turning employability development into a key benchmark for career success under the new career paradigm (Bozionelos et al., 2016; Lo Presti, Törnroos, & Pluviano, 2018; Van der Heijden et al., 2018; Van Harten, De Cuyper, Knies, & Forrier, 2019).

The employment relationship between individuals and organisations is becoming more complicated and transactional under the new psychological contract (Bester, 2019; Niesen, Van Hootegem, Vander Elst, Battistelli, & De Witte, 2018). Correspondingly, to remain employable, knowledge workers like academic staff are required to proactively focus on the acquisition of new knowledge and skills while remaining flexible and adaptive to the expectations of their employers and the job market (Coetzee & Engalbrecht, 2019; Engalbrecht, 2018). On the other hand, organisations are expected to invest in staff's employability development (e.g. training and development programmes) to signal that they care about the latter's employability, so as to trigger reciprocating behaviours (e.g. increased commitment) among employees (Cerdin et al, 2020; Solberg, Lapointe, & Dysvik, 2020).

Upon reviewing recent studies, it is evident that employees express attachment to their organisation and successfully nurture their employability when both the organisation (in the form of learning and development practices) and the employees themselves (in the form of a protean career attitude) signal that they care about their career development. Thus, the question of maintaining and developing people's employability has become an important issue in career management (Baukens, 2017; Lo Presti & Elia, 2020; Van Harten et al., 2020), particularly in societies that favour full-time employment (Coetzee & Engelbrecht, 2019; Guilbert et al., 2018). Working on this issue is important for human resources (HR) practitioners so they can develop policies that facilitate staff's employability while helping organisations maintain healthy talent retention.

The new employment paradigm is not only limited to the industrial and corporate sectors but also the higher education sector. The corporatisation of higher education, characterised by the replacement of traditional governance with corporate managerialism alongside the financial restructuring of higher education institutions (HEIs) in Malaysia (Izharuddin, 2018), has clear relevance for the new employment concept, as it does not guarantee permanent employment but places the onus of employability development on employees (Halai, 2013). In addition, the recent Covid-19 pandemic and the subsequent Movement Control Orders (MCOs) imposed by the government have deeply impacted the tertiary education sector in Malaysia. Particularly, private higher education institutions (PHEIs) in Malaysia face greater financial pressure as the enrolment of students, more specifically international students, is likely to be delayed or deferred (Choong, 2020). The economic growth of the higher education sector has already shown worrying signs, while full-time employees in the sector are facing greater employment uncertainty (Batty, 2020). Furthermore, the rising class of the academic precariat, characterised by part-time and contractual workers, along with the decline in full-time academic appointments, illuminate the increasingly insecure

and unstable employment pattern of academic labour in Malaysia (Izharuddin, 2018; Johannessen, 2019). This diverse quality is not isolated to the Malaysian higher education context, but also a reflects the uncertainties and vicissitudes of employment in Malaysia. Therefore, the researcher has taken a special interest in the variegated quality of employment in the higher education sector by investigating the roles of perceived employability and its psychosocial correlations with academics' career success.

1.2 The Responsibility for Career Management

As has been widely reported, the modern career calls for individuals to assume more responsibilities and become more flexible in managing their career, thereby reflecting a protean attitude. Individuals are less able to rely on their employers to manage their career (Babalola & Bruning, 2015); instead, they are expected to move beyond the single-track career mindset to seek a variety of career options. Obviously, this trend leans towards individualistic career management (ICM), where the responsibility for career management has shifted from employers to employees. Subsequently, a majority of career studies moved from the notion of traditional careers to contemporary concepts that emphasise personal agency (Ballout, 2015; Singh, 2018), which downplay organisational career management (OCM) practices. Indeed, there is little evidence on how organisational support for employee career development contributes to the career success of individuals (De Oliveira, Cavazotte, & Alan Dunzer, 2017; Guan et al., 2014). The shift in the responsibility for career management does not imply that organisations have no say in career management. Careers, to a certain extent, are still managed by organisations as a part of human resource management (HRM), given that in many cases, a wide variety of career management practices and career planning are still carried out by organisations within the HRM area (De Vos & Cambre, 2017). Hence, both organisations and individuals are expected to share the obligations of managing employees' careers rather than being solely dependent on one or the other (Baruch, 2006; Koekemoer, 2014; Soares & Mosquera, 2021).

In fact, though employees nowadays are more protean and careers are less structured, individuals still look for organisational support in pursuing their careers, and organisations are still managing employees' careers systematically (Baruch, 2006; Baruch, Szucs, & Gunz, 2015; Rodrigues, Guest, Oliveira, & Alfes, 2015). Organisations are expected to provide sufficient career development opportunities as well as encouragement for career self-management to demonstrate that employability is better enhanced by staying with, rather than leaving, the organisation. Indeed, employers are adopting work structures that support flexibility and adaptability to form a supportive climate for employee learning and development, which has been found to have significant impacts on organisational as well as individual performance outcomes, such as firm profitability, employees' job satisfaction, perceived employability, and productivity (Moon & Choi, 2017; Soares & Mosquera, 2021; Tortorella, Cawley Vergara, Garza-Reyes, & Sawhney, 2019). The changing nature of the career paradigm has created more opportunities for researchers and human resource practitioners to re-examine the concepts and issues surrounding employability and career management. Accordingly, this topic remains one of the focal points of research for academic scholars in the HRM field (Akkermans & Kubasch, 2017; Gunz, Lazarova, & Mayrhofer, 2020; Lyons, Schweitzer, & Ng, 2015). Even though the landscape of the career has changed and the approaches to career management have evolved at both individual and organisational levels, a balanced view of the roles played by individuals and organisations in shaping future careers should not be underestimated. Furthermore, under the new psychological contract, individuals are encouraged to embrace career self-management through job enrichment, multi-skills, and multiple career paths to enhance their employability. Perceived employability has thus become a major concern in the new career paradigm (Akkermans et al., 2019).

There is a call for researchers to examine the role of employability, particularly its antecedents and outcomes (Callanan, Perri, & Tomkowicz, 2017; Guo, Wang, & Wang, 2019; Van Harten et al., 2017). Some researchers (De Vos, De Hauw, & Van der Heijden, 2011; Soares & Mosquera, 2021) have posited that employability should be understood from both individual and organisational perspectives, such that the interaction between individual attributes and organisational factors should be addressed in studying the antecedents and/or consequences of employability. As such, understanding the importance of both contributing factors in the ways individuals navigate their career successfully deserves attention from researchers as well as practitioners.

As noted by some researchers (De Vos & Buyens, 2006; Moon & Choi, 2017; Singh, 2018; Soares & Mosquera, 2021), limited research has simultaneously addressed individual and organisational career management. In this study, both individual and organisational career management practices were examined in an attempt to identify their differentiated effects on the perceived employability and career success of academic staff from Malaysian PHEIs. Extended research was done in this study to explore the role of perceived employability as a predictor and mediator that further elaborates the nomological relations among all constructs. Furthermore, in response to the call to testify and validate the conceptualisation of employability (Rothwell, 2015; Van Harten et al., 2017), this study operationalised perceived employability as perceived internal employability and perceived external employability instead of treating it as a unidimensional construct, which provides insights into the employees' perception of their employability and career success.

1.3 Private Higher Education in Malaysia

As the then Prime Minister Datuk Seri Najib Tun Razak asserted "Education has been the key to Malaysia's rapid development. It has provided our citizens with knowledge, skills, and competencies that have propelled our nation's growth and, with it, our prosperity" (Ministry of Education Malaysia, 2015). Similarly, as rightly pointed out in the Eleventh Malaysia Plan (11MP), 'human capital' is the key driving force behind Malaysia's economic growth towards an advanced country status in 2020 (NST, 2015), which was then extended to 2025 by former Prime Minister Tun Dr Mahathir (Bernama, 2018). As the turnkey to knowledge transformation, continuous emphasis has been placed on education. Specifically, higher education has been identified as the main source of knowledge workers, in tandem with the shift of the economy from an industrial-based to a knowledgebased one.

In response to the recent trend of globalisation and the internationalisation of higher education, the Malaysian government has undergone several reforms in its education system through the National Higher Education Action Plan 2007-2010, the National Higher Education Strategic Plan beyond 2020, and the Malaysian Education Blueprint of Higher Education (MEBHE) 2015-2025 (Munusamy & Hashim, 2019). The MEBHE 2015-2025, in particular, has outlined a series of strategies to rank the Malaysian higher education system amongst the world's leading higher education systems and to position Malaysia as an international hub for higher education, with the aim to attract 250,000 international students by 2025 (Ministry of Education Malaysia, 2015).

To support the growth of the higher education sector and transform Malaysia's education industry into a vibrant economic contributor, the Malaysian government has also encouraged the active participation of the private sector as a complementary partner in providing higher education. As a result, student enrolment in higher education in Malaysia has increased significantly from 921,548 students in 2008 to 1,323,449 students in 2019 (Ministry of Higher Education Malaysia, 2020).

Accelerating demand for higher education, in conjunction with the government's initiatives to deregulate the higher education sector, has caused the proliferation of PHEIs in Malaysia. As of May 2020, the Malaysian higher education system consisted of 20 public universities and 437 PHEIs (e.g., universities, university colleges, and colleges), inclusive of 10 branch campuses of foreign universities (Ministry of Higher Education, 2021). These PHEIs made up almost 50% (633,344 students) of total student enrolment (1,323,449 students) in Malaysia's higher education system in 2019 (Ministry of Higher Education Malaysia, 2020). The sector also contributed RM31.5bil to the Malaysian economy in 2018 and is expected to reach RM84bil by 2030 based on a projected annual growth rate of five to six percent (Rajaendram, 2020). Undoubtedly, Malaysian HEIs play a significant role in the development of the nation's workforce and economy. Specifically, the development of private higher education has significantly supplemented the public higher education system in producing highly skilled and knowledgeable workers to meet the needs of the gig economy and support Malaysia's pursuit to be a fully developed nation by the year 2025.

1.4 Human Capital in the Higher Education Industry

The increasing demand for and growing commercialisation of higher education pose attractive market ventures into the private higher education industry, which was manifested in the influx of private for-profit institutions and foreign universities into Malaysia's education industry (Grapragasem, Krishnan, & Azlin, 2014; Munusamy & Hashim, 2019). Likewise, the higher education industry is becoming more competitive, driving institutions to be more attentive to their strategies to achieve greater efficiency and effectiveness. The primary objective of acquiring higher student enrolment in the stiff competitive environment compels PHEIs not only to be at the frontier of knowledge and advanced research but to be more stringent in maintaining their academic standards. In fact, with the existence of university ranking systems and governance authorities such as the Malaysia Qualification Agency (MQA), the Rating System for Malaysia Higher Education Institutions (SETARA), and the Malaysia Research Assessment Instrument (MyRA), quality assurance has become an essential mechanism behind the professional recognition of HEIs in Malaysia.

A review of studies on higher education management (Khalid, 2019; Leiber, 2019; Wike & Cahyasari, 2018) reveals that the excellence of HEIs is highly dependent on the qualifications, knowledge, and competencies of their academic community. Academics' expertise and performance (in teaching and research) directly contribute to an institution's success in terms of ranking, scholarly output,

and the satisfaction of stakeholders' expectations (Baruch, 2013; Zacher, Rudolph, Todorovic, & Ammann, 2019). As such, it is crucial for HEIs to acquire and develop their human capital to deliver quality performance in teaching and research (Baruch, 2020), since the presence of qualified and experienced academic staff could be a major selling point to student applicants (Bossu, Brown, & Warren, 2019; Van den Brink, Fruytier, & Thunnissen, 2013). Therefore, effective people management that prioritises career development and growth as well as the retention of academic talent is essential for the success of HEIs.

1.5 Problem Statement

As has been reported, private higher education today is no longer considered an alternative route to tertiary education; instead, its role has moved from a peripheral to a central one in response to the increasing demands for tertiary education (Chin, 2019). Notably, PHEIs' contributions are becoming more important with regards to student enrolment, teaching and learning, research and development, and talent management (Tapsir, 2019). Although the number of PHEIs in Malaysia is continuously increasing, a huge decline has been observed in the number of academic staff members. The total number of academic staff in Malaysian HEIs dropped from 90,483 in the year 2017 to 67,616 in the year 2019. Specifically, academic staff in PHEIs decreased by almost 47% (from 48,643 to 25,961) from 2017 to 2019 (Ministry of Higher Education Malaysia, 2018, 2020). Moreover, recruitment in the higher education sector faces high mobility and an increasingly relevant 'war for talent', leading to the scarcity of academic staff in many disciplines. Notably, the turnover rate in the higher education sector in general has been reported to be higher than other sectors (Rathakrishnan, Ng, & Tee, 2016). In particular, turnover among academic staff from PHEIs is relatively greater compared to other education institutions (Ainer, Subramaniam, & Arokiasamy, 2018). Consequently, these HEIs often struggle with finding the right person, especially from academia, to cater to current and future competency needs, especially since good academic staff are highly sought after by all institutions (Khalid, 2019).

These issues have drawn considerable attention from the industry and the government and raised concerns about academics' career status in terms of their opportunities and success in academia. The focus on creating a more attractive career development pathway for the academic community was encapsulated in the second of the 'Ten Shifts of the MEBHE 2015-2025', which aims to inspire more academicians, researchers, and experienced practitioners to participate in the higher education sector. It is important to highlight that individuals' decisions to stay with or leave an organisation is mainly caused by their perceptions of career and growth opportunities within the career context (Acikgoz, Sumer, & Sumer, 2016; Weng & Zhu, 2020). Whilst HEIs are encouraged to minimize academics' turnover and bolster talent retention, addressing academics' perceived employment opportunities and success is extremely important for the retention of academic staff. Therefore,

it is vital to review and examine academics' career success model to investigate the factors constituting their career opportunities (e.g., employability) and success and, therefore, gain a better understanding of career management in the context of the intensifying 'war for talent' in academia.

Career management issues have been widely studied by researchers over the past decades (e.g. Baruch & Budhwar, 2006; De Vos & Cambre, 2017; Guo et al., 2019; Holtschlag, Masuda, Reicje, & Morales, 2020; Singh, 2018; Wesarat, Sharif, & Abdul Majid, 2014). Both perceived employability and career success have been recorded as the most popular research constructs in the field of career management (Akkermans & Kubasch, 2017; Baruch et al., 2015; Lee, Felps, & Baruch, 2014; Spurk, Hirschi, & Dries, 2019). An examination of the academic works on career management practices suggests the existence of competing perspectives on the theoretical approaches that are better suited to predict the attainment of career success, namely traditional (organisational) versus contemporary (individual) career disciplines (Ongitti, 2018; Soares & Mosquera, 2021; Spurk et al., 2019). Traditional career theorists argue that careers are structured and organisation-focused (e.g. Super, 1957; Wilensky, 1961), whereas contemporary scholars (e.g. boundaryless and protean careers) debate the opposite end of the continuum, stating that careers are individual-focused. Likewise, there is a difference between organisational career management and career selfmanagement initiatives which lead to career success.

Above all, the existing literature (e.g. Cortellazzo, Bonesso, Gerli, & Batista-Foguet, 2020; Hall, Yip, & Doiron, 2018; Wilhelm & Hirschi, 2019) shows that research in the field of career management has moved beyond organisations to focus on more individualistic career models, such as the boundaryless career and protean career. Likewise, a stronger focus on individual factors and declining interest in organisational factors as the main constructs in studying career outcomes have been identified (Li, 2018; Wang & Wanberg, 2017). Some researchers (Baruch, 2006; De Vos & Buyens, 2006; De Vos & Cambre´, 2017; Forrier, De Cuyper, & Akkermans, 2018; Soares & Mosquera, 2021) have expressed their concern that adopting only a single perspective (e.g. personal agency) in reviewing a career management framework cannot address the main factors that thwart career growth and success in the current career context.

Although the emphasis is on individual initiative, employees should interact with their work organisation in mobilising resources to facilitate their career navigation in an uncertain work environment (Bluestein, Kenny, Di Fabio, & Guichard, 2019; Hobfoll, Halbesleben, Neveu, & Westman, 2018). There should be joint responsibility held by both the individual and the organisation for career growth and success. In fact, several authors have acknowledged that organisations continue to play an important role as far as individual careers are concerned (e.g., Chapano, 2017; De Vos & Cambre´, 2017; Holtschlag et al., 2020; Singh, 2018; Soares & Mosquera, 2021). Therefore, it is important to include the organisational viewpoint in conjunction with individual views to understand career practices. This is even more vital considering that in many cases, organisations form the context in which career development takes place (Forrier et al., 2018; Guan, Zhou, Yee, Jiang, & Zhou, 2015). In fact, both organisational career management and individual career management are highlighted as central to employability and career development, since both career practices support the ability of employees to achieve career growth and success either by progressing in one organisation or moving across organisations (Wesarat et al., 2014).

Applied to academics' career context, academic staff tend to be individualistic, making the protean career clearly relevant and suitable for academic careers today (Baruch, 2013, 2020). However, most academic works and projects are performed in a team within the institution, with support from the respective universities (Chapano, 2017). The patterns of recruitment, development, and retention within academia are also managed by institutions under their HRM practices, which has significant implications for academics' career advancement and success (Bedeian, Cavazos, Hun, & Jauch, 2010; Flynn, Field, & Bedian, 2011). This implies that organisational career management practices as well as academics' career.

However, as noted by some researchers (De Vos & Cambre´, 2017; De Vos & Buyens, 2006; Wesarat et al., 2014), there is a limited body of research on how organisational career management interacts with individual career management through the lens of the contemporary career, offering little evidence on its

applicability to the management of academic career success (Baruch & Lavi-Steiner, 2015). Hence, the present study addresses both organisational and individual career management practices to identify their differentiated effects on academics' perceived employability and career success. By doing so, the present study contributes to the existing literature by responding to the calls for a more balanced view of both individual and organisational perspectives in theoretical development. It also provides useful insights to identify the practices that lead to a better perception of employability and career success among academics in Malaysia.

To sum up, there is no 'one-size-fits-all' logic in the field of career studies. Gunz et al.'s (2020) overview on the theoretical and methodological approaches to studying careers found that there is still a lack of clear research boundaries in the field of career studies. Many scholars study the same topic in different ways from different perspectives, which has caused a relatively fragmented knowledge base and disagreement on career outcomes and its influencing factors. Nevertheless, there is a consensus among scholars concerning the need for more integration of micro and meso levels of analysis in the research on social psychology (Jaspal, Carriere, & Moghaddam, 2016) as well as career and employability (Gunz & Mayrhofer, 2018; Van Harten et al., 2017) to provide a better explanation of the complex phenomena in career and employability management.

Despite micro-level (individual) perspectives remaining the dominant paradigm in contemporary career studies, the present study attempted to integrate both micro-level (i.e., individual) and meso-level (i.e., organisational) perspectives in studying academics' career. By integrating the both levels of analysis, the findings provide holistic evidence-based insights into how a successful academic career is managed by the individual and coexists with support from the organisation. Ultimately, the combination of individual responsibility and organisational practices can result in higher employability and career success (Baruch & Budhwar, 2006; De Vos & Cambre´, 2017; Singh, 2018; Weng & Zhu, 2020)

1.6 Research Gaps

A significant number of studies on employability and career management (e.g. Akkermans et al., 2019; Akkermans & Tims, 2017; Bozionelos et al., 2016; Lo Presti & Elia, 2020; Niu, Hunter-Johnson, Xu, & Liu, 2019; Soares & Mosquera, 2021; Van Harten et al., 2017; Verbruggen, Van Emmerik, Van Gils, Meng, & De Grip, 2015) have reported an increasing emphasis on perceived employability as an important factor affecting career satisfaction and success, given that employability is widely regarded as an essential aspect of job security in today's turbulent employment landscape. Yet, empirical evidence on how perceived employability correlates with career success remains unclear (Hogan, Chamorro-Premuzic, & Kaiser, 2013; Lo Presti, Ingusci, Magrin, Manuti, & Scrima, 2019; Olson & Shultz, 2013). Also, past studies addressed perceived employability mainly from the perspectives of its antecedents and/or outcomes (Lo Presti & Pluviano, 2016), thus only explaining bivariate relationships among constructs but lacking insight into the complexity of perceived employability. It was learnt further that there is a dearth of research exploring the mediating effects of perceived employability when both perceived employability and career success are simultaneously investigated in the same research model.

Nevertheless, in recent years, HRM scholars have increasingly focused on the complex interrelationships in HRM models (Chowhan, 2016; Van Harten et al., 2020). As reported by Ringle, Sarstedt, Mitchell, and Gudergan, (2020), researchers in the field of HRM have turned their attention to understanding the impact of HRM practices on attitudinal and behavioural HR outcomes by simultaneously estimating direct, indirect (e.g., mediating), and moderating effects of multiple constructs that constitute the HRM black box. This study breaches the methodology gap by not only verifying that self-perceived employability is correlated with career success, but also investigating the direct and indirect (mediating) effect of perceived employability on academics' career success. The researcher aimed to adopt a contingency perspective by considering the interactions rather than the simple direct relationships that characterise universalistic career management models.

Drawing from Rothwell and Arnold's (2007) conceptualisation, selfperceived employability concerns a person's assessment of his/her position in the internal (e.g. perceived internal employability) and/or external (e.g. perceived external employability) labour market. Conceptually, perceived employability has been treated as a unitary construct, even though the distinction between internal and external employability is frequently discussed in the literature (Cerdin, Liao, & Sharma,, 2020; Nimmi, Zakkariya, & Nezrin, 2020; Rothwell, 2015; Vanhercke, De Cuyper, Peeters, & De White, 2014). Indeed, prior studies have pointed out this issue and argued that the unidimensional nature of perceived employability does not provide much insight into the window of employment opportunities that an individual perceives as within reach and attractive in the internal and/or external labour market (Forrier et al., 2018; Nelissen, Forrier, & Verbruggen, 2017).

Yet, empirical studies addressing the distinction between perceived internal and external employability are still limited (Baranchenko, Xie, Lin, Lau, & Ma, 2020). As such, it remains ambiguous how individuals consider their employment success via internal or external employability, since both differ in scope and focus of opportunities (De Vos, Forrier, Van der Heijden, & De Cuyper, 2017). For instance, studies on the protean career suggest that individuals with a protean mindset attempt to take control and engage in employability development as a precondition to career success (Coetzee & Engelbrecht, 2019; Cortellazzo et al., 2020). Without empirical testing, it is unclear whether protean talents are more likely to remain in their current organisation (e.g., internal employability) or find new employment with a different organisation (e.g., external employability) to determine their career success. Therefore, distinguishing perceived internal employability from perceived external employability will provide a better understanding on whether protean individuals respond differently to the perceptions of internal employability and external employability. Moreover, the
distinction between perceived internal employability and perceived external employability further clarifies if the prediction values of both constructs are equally significant in predicting career outcomes (Cerdin et al., 2020; Lin, 2015).

According to Creed and Gagliardi (2015), people consider both personal resources and contextual factors when estimating their employability. Employability perceptions are thus assumed to be formed by both individual and organisational factors (Forrier et al., 2018; Philippaers, De Cuyper, & Forrier, 2017). Yet, there is a debate on the employability paradox (De Cuyper & De Witte, 2011) that employee development might increase employees' perceptions of employment opportunities in the internal and/or external labour market. High competence workers, especially, are highly attractive to external employers and may increase their turnover intention and reduce their commitment. For these reasons, some employers might be reluctant to invest in staff's employability development. The debate between developing and retaining employees has indeed been a focal point of employability research over the decades (Akkermans et al., 2019; De Cuyper & De Witte, 2011; Rodrigues, Butler, & Guest, 2020).

Surprisingly, empirical research on the employability paradox has been limited to the scope of the link between perceived external employability and employee retention or turnover (De Cuyper, Mauno, Kunnunen & Makikangas, 2011; Nelissen et al., 2017), but has overlooked the impact of employee development practices on perceived internal employability, wherein the latter may lead to the perception of career success within the organisation and subsequently, organisational attachment. Indeed, HRM scholars argue that the link between human resources practices and employability dynamics is more plausible for internal employability but less so for external employability, since organisation-specific training practices are primary aimed at enhancing internal employability (Akkermans et al., 2019; Kraaijenbrink, Spender, & Groen, 2010). Therefore, a better understanding of the complexity of employability is particularly relevant to organisations wishing to secure employee retention. To achieve this, it seems important not only to include a broad range (or single construct) of employability but also to critically differentiate and evaluate various employability forms, such as internal and external employability (Van Harten et al., 2019).

Therefore, the present study built on and resolved the concerns on the employability paradox by discussing the impacts of organisational learning practices on perceived internal and external employability. Specifically, the researcher addressed the key tenets of the employability paradox by comparing the impacts of organisational learning practices on perceived internal and external employability, and further tested the mediating effects of perceived internal and external employability on the relationship between organisational learning practices and career success. The findings are relevant to resolve the employability paradox by aligning organisational learning practices with perceived internal and external employability and validating the perception of career success as staying with the current employer or seeking employment opportunities with other organisations. As a result, HEIs can benefit from understanding academics' perception of their career status and help them navigate their career within the institution so that academics do not perceive external job opportunities more favourably (Baranchenko et al., 2020; Cerdin et al., 2020; Van Harten et al., 2020).

1.7 Research Questions

The aim of this research was to address the gaps identified in related recent studies by answering the following research questions. It was done by providing a holistic framework to consider both individual and organisational career management practices that enhance employees' perception of employability and career success. Also, it is important to recognise the roles of perceived employability in the new career context by investigating the distinction between perceived internal employability and perceived external employability. Thus, the following research questions were formulated for further investigation and validation in the present study.

- To what extent do a protean career attitude and organisational learning practices influence academic staff's career success?
- 2) Do perceived internal employability and/or perceived external employability influence academic staff's career success? Particularly, do academics have discernable perceptions of the impacts of perceived internal employability and perceived external employability on their career success?

- 3) Is there a relationship between a protean career attitude and academic staff's perceived employability? More specifically, to what extent does a protean career attitude influence perceived internal employability in comparison with perceived external employability?
- 4) Is there a relationship between organisational learning practices and academic staff's perceived employability? Particularly, to what extent do organisational learning practices influence perceived internal employability in comparison with perceived external employability?
- 5) Do both perceived internal employability and perceived external employability mediate the relationship between protean career attitudes and academic staff's career success?
- 6) Do both perceived internal employability and perceived external employability mediate the relationship between organisational learning practices and academic staff's career success?

1.8 Research Objectives

In line with the research questions mentioned in the previous section, the following research objectives were raised. The main objective of this study was to investigate the effects of individual (e.g., protean career attitude) and organisation (e.g., organisational learning practices) career management practices on the career success of academics from PHEIs in Malaysia. Specifically, the objectives of the present study were:

- To investigate the influence of a protean career attitude and organisational learning practices on academic's staff career success, with a comparison of the weight of influence of both factors.
- 2) To examine the influence of perceived internal employability and perceived external employability on academic staff's career success, with a comparison of the degree of influence of both factors.
- 3) To examine the influence of a protean career attitude on academic staff's perceived internal employability and perceived external employability to understand if protean individuals have different responses to their perception of internal versus external employability.
- 4) To examine the influence of organisational learning practices on academic staff's perceived internal employability and perceived external employability to understand how these practices affect perceptions of internal versus external employability differently.
- 5) To explore the mediating roles of perceived internal employability and perceived external employability in the relationship between a protean career attitude and academic staff's career success.
- 6) To explore the mediating roles of perceived internal employability and perceived external employability in the relationship between organisational learning practices and academic staff's career success.

Overall, the research objectives focused on exploring the factors driving academics' perceived employability and career success in academia. The role of perceived employability is underscored here, given that the promise of "job security" has been progressively replaced by "employment security", namely employability (Van der Heijden et al. 2018). This study further addressed the distinction between perceived internal employability and perceived external employability to provide insights into academics' perception of their career opportunities and success in academia. The findings will assist HEIs' top management in strengthening HR policies to enhance employees' perception of their employment opportunities in the higher education sector, in addition to helping organisations maintain healthy job retention.

1.9 Research Assumptions

Assumptions in research are facts that are accepted as true by researchers during the study. Though some may be beyond the researcher's control, their nonexistence will render the research irrelevant (Simon & Goes, 2018). In other words, the assumptions made about the research design, population, or other delimitations of this study are presumed to be true by other scholars who read this thesis.

To begin, the researcher assumed that the new career context, supported by the new psychological contract, has emerged as a part of the employment relationship of the research population. Looking at the nature of academic careers, many characteristics fit well with the new psychological contract. Changes in the career context, especially the shift from longer-term relational employment to a shorter-term transactional arrangement, were accepted to be true. Under the new psychological contract, it was assumed that people typically assert personal agency in some aspects of their career development, such that they are partly responsible for directing their career attitudes to accomplish personal goals. Thus, the present study assumed the existence of a protean career, which carries capacities that enable employees to participate more actively in their career development.

Yet, allowing for agentic capacity does not mean that people fully control their career development. Rather, the career outcome is the product of the reciprocal interplay among personal, organisational, and behavioural determinants (Weng & Zhu, 2020). The term protean career was used because the proposed model focused on individuals' purposive behaviour as one of the variables influencing career outcomes – not because of the assumption that individuals act alone in pursuing their aims. As such, it was assumed that while a career is shaped more by the individual than by the organisation, it is not fully controlled by the individual, since employers still play their roles in managing employees' careers. This assumption corresponds with the contemporary career context proposed by scholars in career studies (Baruch, 2006; Koekemoer, 2014; Singh, 2018; Soares & Mosquera, 2021; Wesarat et al, 2014).

Besides, the scope of the present study encompassed tertiary education, where the nature of academic work includes activities like research, teaching, service, and other administration-related functions, all of which are typically conducted under institutional affiliation. It was therefore assumed that organisational learning practices are available in all the participating institutions of the research population. Even though the academic workforce nowadays is more diverse and less secure and academic staff have to be proactive in managing their career development, most academics still seek career support and development from their institutions for them to gain professional development and recognition through research and publication. Indeed, the pursuit of 'meaningful work' within the context of knowledge societies is considered the primary motivation for academics to join this profession.

Moreover, it was also assumed that an academic career differs from the traditional career which is solely measured by hierarchical progression and upward career advancement. An academic career hierarchy is flat, where career progression does not necessarily move 'upward'; rather, it mostly moves laterally. Traditional objective components are thus less aligned in the new career landscape where the individual has greater responsibility in managing his/her career. Therefore, an academic's career evaluation is more appropriately performed by the academic (e.g., self-perception) based on his or her subjective judgment, since there are no absolute measures of career success applicable for all.

1.10 Significance of the Study

Since its inception, the higher education sector has grown immensely and contributed significantly to Malaysia's socioeconomic progress. The increasing involvement of the private sector in higher education has further fostered the progress and stability of Malaysia's higher education sector over the last few decades. As of 2019, the higher education sector is estimated to be contributing at least RM17 billion per year to Malaysia's economy (The Star, 2019). As a result of the ongoing growth in the sector, the 'war for talent' in the recruitment and retention of academic positions is also gaining momentum; nevertheless, it is crucial for HEIs to acquire, develop, and retain human capital to deliver performance in both research and teaching (Baruch, 2013; Khalid, 2019).

Like other private corporations, PHEIs in Malaysia ought to utilise an array of practices to manage and retain their talents, specifically in managing talent's employability and career success to achieve optimal well-being for both employees and institutions. It must be noted that when employees are perceived as highly employable, especially within the organisation, they are more likely to stay and grow their careers with their current employer (Akkermans et al., 2019). On the other hand, employers may benefit from staff employability by helping them develop their ideal career internally and engaging them in a long-term relational psychological contract and organisational commitment (De Vos & Cambre´, 2017; Redondo, Sparrow, & Hernandez-Lechuga, 2019). Thus, this study highlights the importance of perceived employability and career success by investigating the factors that determine these concepts and taking a more convergent view that empirically compares the contributions of individual and organisational factors to academics' perceived employability and career success.

The present study is expected to contribute to employability and career studies from both theoretical and practical standpoints. Theoretically, this study provides a balanced view of both individual and organisational factors in the literature, even though most employability and career studies have adopted an agentic (e.g., individual-focused) perspective. In doing so, the findings from this research offer further confirmation that employability and career management is not the sole responsibility of the individual, but a shared responsibility among employees and their organisation. By capturing academic career outcomes from a realistic vantage point, the researcher compares the weight both individual and organisational influence in shaping academics' careers, which enriches the theoretical value and practical relevancy of the present study.

Since testing mediational frameworks are considered 'almost mandatory' and vital to theory development (Bullock, Green, & Ha, 2010; Memon, Cheah, Ramayah, Ting, & Francis, 2018), the researcher specifically highlighted perceived internal employability and perceived external employability as the mediating mechanisms explaining academics' career success. The inclusion of these mediators and the comparison of their predictive values is a noteworthy bridge to the research gap, given that perceived employability is widely viewed as the central tenet in contemporary employment relationships, though both internal as well as external employability need to be nurtured to achieve career success (Kirves, Kinnunen, De Cuyper, & Mäkikangas, 2014).

Also, this study aimed to generate a new structural model derived from Lent and Brown's (2006, 2008, 2013) Social Cognitive Career Theory (SCCT) and extended to the context of academics' career success in academia. By integrating the core cognitive constructs of the SCCT (e.g., perceived internal and external employability) with personal constructs (e.g., protean attitude) and contextual constructs (e.g., organisational learning practices) to explain and predict behavioural outcomes (e.g., career success), this overarching career model sought to add valuable insight into existing knowledge in the employability and career literature.

Apart from that, from a practical standpoint, this study generates practical implications for relevant stakeholders in the higher education industry in Malaysia. The findings highlight that it is extremely important to recognise that both individuals and PHEIs are responsible for managing academics' perceived employability and career success. As such, academics are expected to demonstrate a more flexible and proactive work attitude, while PHEIs should be committed to HRM investment by offering more opportunities for developing and assisting

academics' career success within the institution and/or beyond organisational boundaries.

Moreover, this study aimed to probe the potential mediating role of perceived employability in greater detail by exploring academic perceptions of his/her (future) career possibilities, which involve either staying with the current employer or moving on with other employers. Bringing in the employability paradox perspective, the findings in this study may contribute better information for PHEIs with regards to their investment in organisational learning practices (or support) that enable them to be aware of their academics' future career possibilities. As such, PHEIs may develop suitable strategies that embed academics within the institutions (e.g., internal employability), or may even rethink the employment relationship to allow academics to develop a portfolio career beyond the institution's boundaries in the form of increased marketability and career opportunities. This valuable information may provide an impetus for organisational intervention and retention programmes since human resources in the tertiary education industry has high mobility. Lastly, this study will also benefit policymakers in Malaysia's higher education sector by providing them with relevant opinions from academics on their expectations of career value and opportunities in academia. This information is particularly important for the government to develop policies to engage talented academics and thereby sustain the quality and competitiveness of Malaysian higher education in the age of internationalisation and the commodification of higher education.

1.11 Study Delimitations

Delimitations in research are characteristics that define the scope and boundaries of a study to provide more clarity and relevancy (Creswell, 2014). There were a few delimitations in this study that explicate the criteria of the respondents who participated, the geographic region covered, and the intended accomplishments of this study.

First, the participants who enrolled in this study were in-service academic staff at PHEIs in Malaysia. The private higher education sector was selected due to its significant contribution to the nation's economy which has been manifested as one of the National Key Economic Areas (NKEA) under the National Transformation Programme [Performance Management & Delivery Unit, (PEMANDU), 2012]. Furthermore, the selection of PHEIs as the focus of the study was also due to the growing importance and contribution of PHEIs in teaching, research, and commercialisation activities. Their roles have moved from peripheral to central in response to internationalisation and increasing demands for tertiary education in local as well as global markets (Chin, 2019).

Second, this study only accepted the sample of academic staff from PHEIs, excluding academic staff from public universities in Malaysia. This was because the nature of academic work in PHEIs is different from that of public universities in terms of job functions and performance indicators. Academics in PHEIs are more focused on teaching and commercialisation activities while public universities emphasise research and knowledge development and sharing (Abu Said, Mohd Rasdi, Abu Samah, Silong, & Sulaiman, 2015). Thus, academics' performance appraisal system or success indicators vary between both entities.

Third, this study was delimited to only Malaysian academic staff from the PHEIs in Malaysia. It appears that there are some cultural differences between Malaysian societies and other countries, given that the Malaysian cultural environment is framed by ethical/racial diversity. Therefore, academics' perception of the employment relationship, their attitudes, and their behaviours toward career outcomes may diverge between Malaysian and non-Malaysian academic staff.

The above delimitations were able to narrow down the scope of the study to enhance the relevancy of the findings in explaining Malaysian academics' career success.

1.12 Definition of Terms

The present study focused on the academic career context in employability and career research. There are key terms used throughout this thesis that need to be clarified. The following terms were defined in the context of this research and presented as follows: **Career** has been defined in earlier studies as "the moving perspective of a person with references to the social order, and of the typical sequences and concatenation of office" (Hughes, 1937, p. 413). The definition of a career has expanded over time to include sociological and psychological outcomes that a person accumulates from his/her working experience. A modern definition by Arthur, Hall and Lawrance (1989) regards career as an unfolding sequence of a person's work experience over time. Greenhaus and Kossek (2014) proposed a work-home perspective on careers that recognises the interdependency between work and home over the life course, which is particularly relevant to contemporary careers.

Career success is an outcome a person experiences in his/her career. Arthur, Khapova, and Wilderom (2005) defined career success as "the accomplishment of desirable work-related outcomes along a person's work experiences" (p. 179). Typically, career success is operationalised along two dimensions, i.e., objective and subjective, whereby the distinction between objective and subjective career success has received much attention in conceptual work (Spurk et al., 2019). Objective career success reflects the indicators that are directly observable by others and measurable in a standardised way (Gunz & Heslin, 2005; Spurk et al., 2019). Subjective career success is an individual's evaluation and experience of achieving personally meaningful career outcomes (Ng, Eby, Sorensen, & Feldman, 2005; Shockley, Ureksoy, Rodopman, Poteat, & Dullaghan 2016). **Employability** is defined as "an individual's chance of a job in the internal and/or external labour market" (Forrier & Sels, 2003, p. 106). Employability reflects an individual's ability and capability in the acquisition and fulfilment of employment, within or outside the current organisation, today and in the future. Lo Presti and Pluviano (2016) provided a new heuristic model, defining employability as "A personal resource that individuals develop across their working lives aimed at increasing one's own career success, both attaching importance and committing to making sense of past work experiences and envisioning one's own professional future, acquiring valuable competencies and skills, improving their formal and informal career-related networks, exploring their social environment in search of opportunities and constraints to their own career pathway" (p. 5).

Perceived employability is defined as "the individual's perception of his or her possibilities of obtaining and maintaining employment" (Vanhercke et al., 2014, p. 594). Wittekind, Raeder, and Grote (2010) elaborated perceived employability as the individual's subjective evaluation of the possibility of finding a job that is like the current position or a new occupation in the external labour market. Similarly, Akkermans et al. (2019) conceptualised perceived employability by focusing on employees' perceptions of their chances in the internal and external labour market. Perceived employability can be treated as a unitary or separate construct made up of internal and external employability, depending on the purpose of the study. Perceived internal employability is a person's belief of maintaining his/her employment within his/her working organisation, whereas perceived external employability is about acquiring future jobs in the external labour market (Forrier, Verbruggen, & De Cuyper, 2015; Sultana & Malik, 2020).

Psychological contract is a concept first introduced by Agyris (1960), described as an existing implicit understanding between two contractual parties. It was further developed and applied to underscore employees' perceptions regarding the terms and conditions of a reciprocal exchange agreement between the employee and the employer. Rousseau (1989) further defined a psychological contract as "an individual's belief regarding the terms and conditions of a reciprocal exchange agreement between that focal person and another party" (p. 123). The New psychological contract emerged due to the shift in the career paradigm where the employment relationship has transformed from a relational to a transactional one. The new psychological contract is the replacement of job security (or job for life) by employability or employment security (Bester, 2019).

Protean career was conceptualised by Hall (1976) as "a process which the person, not the organisation, is managing" (p. 201). Protean careers are characterised by the exercise of self-direction and focus on intrinsic values in the pursuit of psychological success (Hall et al., 2018). The indicator of success in a protean career is internal or psychological success instead of external success.

Protean career attitude was described by Briscoe and Hall (2006) as the attitude in which an individual manages his/her career in a proactive, self-directed

way, driven by personal values to define career success. Along with the conceptualisation from Briscoe, Hall, and DeMuth (2006), Water, Briscoe, Hall, and Wang (2014) and Hall et al. (2018) defined a protean career attitude as an attitude towards one's career that involves self-direction and value orientation. Thus, the manifestation of a protean career attitude is a combination in which an individual is high in both self-directed and value-driven career attitudes.

Organisational learning is defined as "the acquisition of new knowledge by actors who are able and willing to apply that knowledge in making decisions or influencing others in the organisation" (Miller, 1996, p. 486). Drawing from the synthetic review of organisational learning theories, Beauregard, Lemyre, and Barrette (2015) defined organisational learning practices as a set of collectively shared practices between an organisation and its members, where organisational knowledge is assumed as a power resource pivotal to the sustainable development of organisations as well as their members. Specifically, organisational learning practices are most often used to explain quantifiable learning activities and primarily involve individuals whose jobs require certain skills that assist the organisation in increasing its competitive advantage. Organisational learning practices are synonymous with activities that lead to successful outcomes (McShane & Tasa, 2018).

1.13 Structure of Report

In pursuit of the stated research objectives, the report was organised as follows:

Chapter 1 was an introduction to the main issues investigated in this study. An overview of the private higher education sector and the human capital issue in Malaysian higher education were presented. The research problems were formed, derived from the gaps identified in the existing research. Accordingly, the aim and objectives of this study were put forward and the justification of this study was explained through the significance of the study.

Chapter 2 provides a comprehensive review of the literature revolving the issues under investigation. A critical analysis of individual and organisational career management practices is discussed, followed by an overview of the concepts of career success, perceived employability, protean career attitude, and organisational learning practices. Moreover, an extensive discussion of the theories underlying this study and the correlations among the variables are reviewed and reported. This is followed by the development of the conceptual framework to outline the hypotheses on the links between the independent variables, dependent variables, and mediating variables.

Chapter 3 describes the research methodology adopted to empirically test the hypotheses and validate the research framework. Extensive discussions on the research design, the measurements of the variables, sampling procedure, and data collection methods are reported. Moreover, a detailed explanation of the statistical procedures using SmartPLS for data analysis is presented along with ethical considerations.

Chapter 4 presents all the statistical results from the data analyses. The findings from data refinement, content validity, and pilot testing are first discussed in detail. Results of the descriptive statistics, measurement model, structural model, path analysis, and mediation tests are reported. The chapter concludes with results of the hypotheses testing and justification.

Chapter 5 discusses the findings obtained from data analysis in the previous chapter. Specifically, the discussion of the research findings in response to the research questions, objectives, and hypotheses are presented. Finally, the implications of this study, both theoretical and practical, and avenues for future research in line with the limitations of the study are also explained.

1.14 Chapter Summary

This chapter explained the background of this study on the trends and issues in managing human capital in the context of Malaysian HEIs. The research problems were identified, followed by the research gaps derived from existing research. Accordingly, specific research questions were formed, and research objectives were set to answer these research questions. The significance of the study and the outline of the report were presented. The next chapter will discuss the literature review, research framework, and hypotheses statements for this study.

CHAPTER 2

LITERATURE REVIEW

2.1 Introduction

This chapter reviews the theoretical and empirical literature revolving around the issues related to career studies. An extensive literature review relative to the concepts of career success, employability, protean career, and organisational learning practices is presented. It comprises the discussion on the conceptualisation of career success by highlighting the changing nature of career from individual and organisational career management perspectives. Specific discussion on academic career and conceptualisation of academic career success, and the key predictors of academics' career success, is reviewed in this chapter. This is followed by the justification of the relationship between the exogenous variables, mediating variables, and endogenous variables. Subsequently, a conceptual framework is developed based on the research hypotheses presented.

2.2 Conceptualisation and Evolution of Career

Career was defined in earlier studies as "the moving perspective of a person with references to the social order, and of the typical sequences and concatenation of office" (Hughes, 1937, p. 413). Over time, the definition of career has been expanded to include sociological and psychological outcomes that a person accumulated from his/her working experience. Super (1957, 1980) argued that a career should consider the constellation of a person's life roles and viewing career from the context of the changing demand of a person's life cycle. A widely accepted description of a career from Arthur et al. (1989) regard career as an unfolding sequence of a person's work experience over time. Greenhaus and Kossek (2015) view careers from a work-home perspective, suggesting that the interdependencies between work and home over the life course are suitable for explaining contemporary careers. Meanwhile, Ke, Li, and Powell (2018) view career as a person's occupational development, work-related mobility, and the achievement of work-specific goals within one or more employment organisations.

Over the years, there has been a noticeable evolution in how a career was defined and managed (Kalleberg, 2018). Traditional careers associated with upward mobility and job security are receding, witnessed by the transition of career systems from long-term employment within a single organisation to short-termism, unpredictable and multidirectional career (Negoiță's, 2020; Niesen et al., 2018). The psychological contract between individual and organisation was, to a greater or lesser extent, undermined, and the responsibilities of the organisation had been relatively neglected (Davey, 2020). Employees are assuming more responsibilities with a high tolerance for change and have more career options in navigating their careers. A modern career is no longer constrained within a single organisation but becomes more boundaryless and more protean, shifting the responsibility for career

management from organisation to individuals (Holtschlag et al., 2020). Career selfdirectedness emerged as a new concept reflecting individuals' agentic career attitude, assuming that individuals can be self-regulatory in their career management and development (Hall et al., 2018; Li, 2018). The relationship between the organisation and employees has become more complicated and transactional under the new psychological contract (Bester, 2019), as shown in Table 2.1.

avee Responsibilities
byee Responsionnies
vering work according to quality standard king the required hours asparency alty bect for co-workers and nisational resources essionalism ptability

Table 2.1: The Content of New Psychological Contract

Source: Bester (2019)

Several new metaphors have emerged to encapsulate the dynamics of the modern career. Boundaryless career initiated by Arthur (1994, 2014) views the career as transactional, short-termism and not confined to a single organisation. The gig economy offers suitable conditions for boundaryless careers (Kost, Fieseler, &

Wong, 2019). Individuals with a boundaryless mindset are motivated to move across the organisation and occupational boundaries to seek various opportunities for professional growth and career progression (Arthur et al., 2005). As Lo Presti, Pluviano, and Briscoe (2018) suggested, the major mean to determine success in a career is gaining 'employability' rather than 'secure employment' under the boundaryless career context.

Intelligent career (De Fillipi & Arthur, 1994), which was introduced alongside a boundaryless career, proposed three career competencies: know-why, know-how, and know-whom, critical for a self-directed career. "Knowing-why" relates to self-awareness and construction of career expectations, while "knowinghow" relates to knowledge, skills, abilities, and attitude that individuals engage in to perform well in work. "Knowing-whom" refers to career networking within and outside the organisation that enhance career opportunities and employability. These three knowing career competencies that support the construction of a person's career path may play a vital role in generating desired career outcomes (Sultana & Malik, 2019).

In addition, portfolio career (Cawsey, Deszca, & Mazerolle, 1995) and postcorporate career (Peiperl & Baruch, 1997) have spread in response to the limited possibility for career progression within the organisation, where traditional vertical career path has been replaced by horizontal links that transcend geographical and organisational boundaries. In this sense, these new career models proposed various options and directions for employees to define their career. The career systems have witnessed major transformations from linear to multidirectional career paths (Baruch, 2010; Negoiță's, 2020).

Among the theories focusing on the self-directedness career system, protean career (Hall, 1976, 1996, 2004) is recognised as the most innovative approach reflecting an individual's real-life career experiences. Hall et al. (2018) stated that the protean career attitude is the most appropriate career mindset to represent a self-directed career context. They further described protean career as a self-directed career approach where the individual, rather than the organisation, takes control of his or her career path across multiple employers' settings, whereas the roles of the organisation were fully obsolete.

Given the growing empirical research underlying personal agency or selfmanaged career, protean career has become an increasingly important, popular, and widely acknowledged contemporary career model over the last two decades (Briscoe, Henagan, Burton, & Murphy, 2012; Cortellazzo et al., 2020; Gubler, Arnold, & Coombs, 2014). Several career studies since 2000 have been increasingly focused on an agentic career like protean careers as theoretical approaches for studying contemporary career (Spurk et al., 2019). Also, Shen and colleagues (2015), who examined the perceived meaning of career success across different countries contexts, found that agentic view of careers is a particularly prominent and widely accepted career approach across the globe. Undoubtedly, despite the significance of a self-managed career in a modern career context, an organisational career is also evident in recent time (Adcroft & Taylor, 2013; Baruch et al., 2015; Davey, 2020; Forrier et al., 2018; Rodrigues et al., 2015). Organisations still play an important role in supporting their employees to pursue their career goals, particularly in the academic career context, which required extensive application of knowledge for individual and institutional success. The following section further elaborates on the differences between individual and organisation career management practices.

2.3 Career Management Perspective: Individual versus Organisation

Career management has been widely studied by researchers over the past decades (e.g., De Vos & Cambré, 2017; Holtschlag et al., 2020; Ongati, 2018; Singh, 2018; Wesarat et al., 2014). A review on the studies of career management revealed two main career management approaches that may be used to predict individual career success: organisational career management (OCM) versus individual career management (ICM; Akkermans & Kubash, 2017; Guo et al., 2019; Ongitti, 2018; Wesarat et al., 2014). OCM is planned and managed by organisations, whereas ICM is controlled by individuals to manage their careers. Both practices differ in scope and nature of initiative that leads to career success. Table 2.2 summarises the synthesis review on the differences between organisational career management practices and individual career management practices.

Organisational Career Management	Individual Career Management
Practices*	Practices
 Informational mechanism: career counselling (Baruch, 2010); training and learning (Rowley, Kang, & Lim, 2016); performance feedback (Cappelli & Keller, 2014). Developmental mechanism: training and development (De Vos & Cambré, 2017; Verbruggen et al., 2015); organisational learning and competencies development (Lip-Wiersma & Hall, 2007; Wesarat et al., 2014). Relational mechanism: matching organisational and individual needs (Singh, 2018); superiors' and colleagues' support (De Vos et al., 2011); mentoring (Malhotra & Singh, 2016). 	 Employees are the central actors in managing their own career (De Vos & Segers, 2013) Networking (De Fillipi & Arthur, 1994; Zacher et al., 2019) Proactive behaviours and self-directed (Briscoe et al., 2006; Hall, 2004) Proactivity and adaptability (Rodrigues et al., 2015) Self-awareness and environmental awareness (Uy, Chan, Sam, Ho, & Chernyshenko, 2015; Weng & Zhu, 2020) Self-directed and value driven (Briscoe & Hall, 2006; Cortellazzo et al., 2020; Hall et al., 2018). Personal goal oriented (Direnzo, Greenhaus, & Weer, 2015; Holtschlag et al., 2020)

Table 2.2: Organisational Career Management Practices versus Individual Career Management Practices

*Note: Adapted from Bagdadli and Gianecchini (2019).

The dynamics of modern career have increased, rendering it less predictable. In a similar vein, modern employees are expected to be highly adaptable and be self-reliant to survive in this complex environment (Callanan et al., 2017). Employees take more control of their career path than being dependent on the organisation to manage their careers. Self-directed and individually customised career paths have gained importance in the new career context (Haenggli & Hirschi, 2020). Past studies revealed numerous definitions of career self-management. Greenhaus, Callanan, and Godshalk (2010) define career (self-) management as "a process by which individuals develop, implement, and monitor career goals and strategies" (p. 12). Meanwhile, Wilhelm and Hirschi (2019) conceptualised career self-management as "a process of action regulation and a resource management" (p. 119), where an individual with highly conscious and proactive behaviour, not the organisation, regulates this process ultimately. Hence, individual career management is an attitude reflecting the feeling of personal agency, and the individual is highly self-regulatory when it comes to career management and development.

In parallel with the assumptions on the existing literature (Briscoe et al., 2006; Direnzo et al., 2015; Hall, 2004; Holtschlag et al., 2020), the present study conceptualised career self-management as a protean career attitude, thus proposing that individuals should possess a strong sense of self-directed and value-driven attitudes to realise the potential of career self-management. Importantly, protean career attitudes have clear relevance and fit well with the new agentic career context since the values like freedom and adaptability are showcased as self-directed perspectives under a protean career (Hall et al., 2018; Rodrigues et al., 2015). Also, the protean career attitudes characterised as flexible, self-directed, and value-driven set the foundation for individual career management initiatives, and these attitudes were found associated with several career outcomes, such as higher perceived employability (Cortellazzo et al., 2020; Sultana & Malik, 2020), greater career and life satisfaction (Herrmann, Hirschi, & Baruch, 2015; Rahim, 2020; Zhang, Hirshi,

Herrmann, Wei, & Zhang 2015) and more favourable career success (Hall et al., 2018; Lo Presti et al., 2018a). Though it appeals mostly to managers and professionals in the corporate world, the protean career also has a clear relevance and fits academics.

Even though individual career management is prevalent in the new career context, the limitations of ICM practices could not be ignored. Critics of ICM practices stated that too much responsibility had been placed on the individual in the new career context (Baruch, 2006; Baruch & Bozionelos, 2011; Clarke, 2013; Soares & Mosquera, 2021), whereby many employees are facing difficulties in adapting themselves to the new organisational forms, which require a high level of tolerance for uncertainty and flexibility in the non-traditional career settings (De Vos & Cambré, 2017). Furthermore, modern career under the new psychological contract has reappraised the mutual expectations between employer and employee due to increasing demand for multi-skills and high-performance employees in exchange for competency development from the employer (Bester, 2019). The academics work nature in the knowledge-intensive organisation such as higher learning institutions requires lengthy and systematic learning and development plan in dealing with career development, available and conducted by the institutions, who have the power, resources and information (Baruch, 2013; Zacher et al., 2019). Although institutions still play an important role in academics career management, the role has been shifted from command and control to facilitate and support the

individual to pursue their career goals in line with the current view on individualistic careers (De Vos & Cambré, 2017; Singh, 2018).

Considering a contemporary view of a career as flexible and individualised, OCM is conceptualised as the range of activities undertaken by the organisation to support an individual's professional and career development, in contrast with the traditional career planning that emphasises formal hierarchical progression (De Vos & Cambré, 2017; Ongiti, 2018). Research and practice have continued to place organisational career management as the main strategy to feeding the "talent pipeline" under the human resources function (Crowley-Henry, Benson, & Al Ariss, 2018; De Vos & Cambré, 2017; Koch, Forgues, & Monties, 2017). Lip-Wiersma and Hall (2007) argued that organisations should opt for a broader approach to career management practices by developing and integrating; capacity and employability, strategic and structural integrations, cultural integration, diversity management, and communication, i.e., more in line with the characteristics of the new career. In addition, Bagdadli and Gianecchini (2019) identified three main mechanisms in OCM practices—informational, developmental, and relational that support and increase individual competencies in navigating their career, and the leverage of these three mechanisms able to enhance the individual's career success.

Although organisations tend to offer OCM practices in combination, there is no "general accepted typology of OCM practices" (De Vos, Dewettinck, &

Buyens, 2008, p. 162). Accordingly, the present study uses organisational learning practices to represent organisational career management practices (Watkins & Marsick, 1996, 2003). Organisational learning has been postulated as part of employees' daily activities supported by the organisation, to enhance the employees' knowledge, skills and ability, which in turn, impact their performance (Crouse, Doyle, & Young, 2011; Kumar, 2019) and workforce agility (Abdelhamid & Sposato, 2019). Likewise, the dimensions of the learning organisation model (Watkin & Marsick, 1997; Yang, Watkins, & Marsick, 2004) was adapted to reflect the organisational learning practices, and this concept was widely accepted as an integrative model that reflects the organisational supportive and developmental career practices (Camps, Oltra, Aldás-Manzano, Buenaventura-Vera, & Torres-Carballo, 2016; Iskandar & Burhan, 2019; Jan, 2010; Park, 2009b).

To sum up, the new career paradigm (e.g., protean career) has proven to be a remarkably influential concept in contemporary career studies, and a wide body of research has addressed the nature of individual career management impact upon individual career outcomes (Cortellazzo et al., 2020; Direnzo et al., 2015; Herrmann et al., 2015; Rahim, 2020; Weng & Zhu, 2020; Zhang et al., 2015). Nevertheless, there are also increasing calls for organisations' renewed roles in the study of careers (Akkermans & Kubasch, 2017; Clarke, 2013; De Vos & Cambré, 2017; Guo et al., 2019; Lee et al., 2014). Individual career management and organisational career management are not mutually exclusive, and both organisation and individual career management have been highlighted as important to career success (Wesarat et al., 2014). However, a lack of insight remains of the convergence of individual and organisational career management practices in understanding employees' career success (Baruch et al., 2015; Guo et al., 2019; Soeras & Mosquera, 2020). With this in mind, this study addresses both organisational and individual career management practices in an attempt to identify their common and differential effects on individual career outcomes to capture the contemporary career realities.

2.4 Academics' Career in Higher Education

An academic career is a unique career path that differs from other traditional career models, solely dependent on hierarchical progression (Baruch, 2013; Zacher et al., 2019). The academics hierarchy scale is flat, and the nature of career movement in academia may not necessarily be directed 'upward' within a single organisation, as it comprised mostly lateral movement and open career path. One of the apparent benefits of an academic career system is that it offers more options for individuals to explore their career. In this respect, a professor may hold administrative roles, such as the Dean or Head of School, and he/she may return to research and teaching works after performing the managerial roles throughout his/her career. Besides, some academics might engage in multiple roles, e.g., being a lecturer cum academic leader, over certain periods or even most of their academic career. Nonetheless, the most prominent roles of knowledge development and

knowledge sharing via teaching, research and publication are unavoidable in academics.

In academia, most academics are engaged in teaching, research, and administrative roles throughout or in a particular phase of their careers (Zacher et al., 2019). Gail Neely, Smith, Graboyes, Paniello, and Gubbles (2016), in their publication on the guides to academic career development, suggested some important prerequisites to a successful academic career inclusive of teaching and learning, commitment to high-quality research, acquiring funding sources, and some administrative works such as supervision and mentoring. Similarly, Arokiasamy, Ismail, Ahmad, and Othman (2011) stated that academics' roles have become more important, especially in a developing country like Malaysia. Nowadays, the academic roles are also becoming multi-faceted, where their functions include teaching, research and publication, administration, and other consultative and commercialisation works.

Today's workplace witnessed considerable changes where an overwhelming sense of job insecurity and attendant job loss are the new normal (Callanan, 2017). By taking a view of academic's career through the lens of modern context, the academic workforce nowadays is becoming more diverse, less secure, and arguably less satisfied (Clegg, 2008; Izharuddin, 2018; Sutherland, Wilson, & Williams, 2013) since employers now place less (or no) emphasis on long-term relational bond but instead favour short-term transactional focus (Cappelli & Keller, 2014). Thus, academics nowadays tend to be more individualistic and hold more responsibilities for career management and growth. The protean career that mostly appeals to the corporate world professionals is relevant and applicable to the academic profession (Baruch, 2013). Academic staffs are expected to proactively manage their career portfolio through continuous competency development such as participating in research and publication and attending the conference and paper presentation (Zacher et al., 2019) to enhance their value and marketability.

However, most academics, particularly academics from PHEIs, struggle to find congruence between academic professionalism and modern academic work realities. They are frustrated in balancing the institution demands in teaching and administrative work, with the need for academics to manage and develop their career profile (Ainer et al., 2018) via research and publication, paper presentation and professional development under the condition of resource constraints. Trowler and Bamber (2005) assumed the relationship between academics and institutions as a 'game with different rules and competing goals', particularly in meeting the needs for teaching versus research works. While academic staffs view research as their core job functions, institutions assume their responsibilities to involve teaching and other administrative-related activities. Many academics were often overloaded with teaching-related demands and no time left to establish their research profile (Ainer et al., 2018; Chapano, 2017). Even though many academics perceive teaching as a time-consuming activity, establishing a research and publication profile is the main indicator for career progression.

Furthermore, most academics pursuing their careers in academia presume that academia is a 'high-impact career' concerning the recognition and contributions toward society. As pointed out by Gappa, Austin, and Trice (2005), 'intellectual challenges and stimulation' are among the primary motivations for academics in joining this profession, where they can pursue meaningful work and reach balance in life within the context of knowledge societies.

Career support and developmental opportunities from universities are the most commonly practised strategies to facilitate academics' career progression and success to manage the differences of expectations between academics and institutions (Abu Said et al., 2015; Derosier, Kameny, Holler, Davis, & Maschauer, 2013; Zacher et al., 2019). Some researchers also suggested that academic works are a social process often involving the interaction between academics and the institution, where the academics' work values, attitudes, and beliefs are shaped by contextual forces such as organisational learning and developmental practices (Adcroft & Taylor, 2013; Shamsir & Ismail, 2013). Similarly, Mathieson (2011) and Sutherland et al. (2013) revealed that the structural (e.g., organisation) and agency (e.g., individual) factors must be considered while investigating academic productivity, success, and satisfaction. Most academic careers are still strongly bonded to the traditional career system. The academic career model fits well with the contemporary career context, though in many aspects, it is still traditional (Baruch, 2013).
2.5 Conceptualising Career Success

Career success is defined as "the accomplishment of desirable work-related outcomes along a person's work experiences" (Arthur et al., 2005, p. 179). Career success has been a focal research topic in the management and organisational behaviour field in recent years (Akkermans & Kubasch, 2017; Baruch et al., 2015; Spurk et al., 2019), and the notion of career success has been increased relevance in the new career context with dramatic changes in the employment relationship. Along with the changes, there has been a major shift in how career success is conceptualised (Abele, Spurk, & Volmer, 2011; Bester, 2019; Kalleberg, 2018). Typically, career success can be seen as both objective and subjective.

The success of a career objective is mostly observable, measurable, and normally serves as a benchmark for occupational status and success in a traditional career context (Arthur et al., 2005). Judge, Cable, Boudreau, and Bretz (1995) suggested that the three most used indicators for objective career success are salary or income, number of promotions, and occupational status. Accordingly, objective career success, mostly externally verified (Ng & Feldman, 2014), refers to the external perception of an individual's career progress (Hirschi, Nagy, Baumeler, Johnston, & Spurk, 2018).

Subjective career success is referred to an individual's perception and experience of his/her career accomplishments and achievement of meaningful career outcomes (Judge et al., 1995; Shockley et al., 2016). As modern career has become more complex and the employment relationship more complicated, modern career theorists (e.g., protean career, boundaryless career, and kaleidoscope career) suggest that the conceptualisation of career success should be extended beyond traditional objective measures and emphasised on psychological success such as career flexibility, work-life balance, and career self-determination, as the main criteria in judging a person's career success (Hall et al., 2018; Ng & Feldman, 2014; Shockley et al., 2016). Accordingly, modern employees place greater value on subjective career experiences such as career satisfaction (Savickas, 2013; Zhang et al., 2015), career wellbeing (Bester, 2019), and more recently, the perceived employability and prospect of work (Callanan, 2017; Lo Presti et al., 2019) and career growth and development (Weng & Zhu, 2020), to determine their career success.

Although objective and subjective career success is conceptually different (Hirschi et al., 2018; Ng et al., 2005), it has been argued that either the objective or subjective dichotomy can fully explain the complexities of a person's career experiences (Ituma, Simpson, Ovadje, Cornelius, & Mordi, 2011). There is no absolute measure of career success applicable for all, and what an individual value in his/her career might not be valued in the same way by others (Gunz & Heslin, 2005). Rather than presuming the objective career success is 'replaced' by subjective career success, it would be more appropriate to suggest that both objective and subjective indicators of success must be abreast to reflect the true

nature of career success (Otto, Roe, Sobiraj, Baluku, & Garrido Vasquez, 2017). Given that career success is built up internally and involves the objective and subjective aspects, the present study compared the objective and subjective success indicators to measure academic career success.

2.5.1 Conceptualising Academics' Career Success

Like any corporate professions and managers, success in academia is observable from objective and subjective indicators. Past studies imparted that the conceptualisation of success in academia was based almost exclusively on objective outcomes, such as the number of papers published and citations, grants awarded, the number of citations, student evaluation scores, and metrics achieved (Bostok, 2014; Santos, 2016; Stupinsky, Weaver-Hightower, & Kartoshkina, 2015). In contrast, the subjective career success indicators in academia are rarely studied (Bilmoria et al., 2006; Canal-Dominguez & Wall, 2014). However, compared to other professions, academics typically are more willing to accept a relatively lower salary and limited promotion opportunities (Roach & Sauermann, 2010), and they strongly value intrinsic work motivations such as freedom, satisfaction, and recognition.

Interestingly, the expectations of academic career success vary besides defined differently by academics at every turn. Although some predominant indicators of success such as research productivity, job satisfaction, and recognition have been agreed upon by the academics and researchers, these success indicators, however, are not consistently implied in the higher education studies (Bostok, 2014; Santos, 2016; Stupinsky et al., 2015). The dearth of studies offering a holistic view of success has raised the call for broader, more personal success measures, trying to balance potentially conflicting expectations and hopes in academic careers.

By capturing career phenomena from a realistic vantage point and taking a more holistic view of success in academia, the present study argues that academic career success must be constructed internally (or personally) and incorporate objective and subjective dimensions. For this reason, the researcher identified academics' career success by capturing the key measures for objective and subjective success in academia primarily adopted in the existing literature from different higher education studies. For the most part, the constructions of academic career success in this study were captured from Sutherland's (2015) thematic analysis.

Table 2.3 summarises the objective and subjective measures of success in academia into some major success themes inclusive of research productivity (e.g., publication output and grant funding awarded), workplace environment (e.g., promotion, salary and status), satisfaction (e.g., job satisfaction and life satisfaction), psychological successes (e.g., freedom, work-life balance, and contribution), and teaching performance (e.g., supervision and student evaluation), as stated by Sutherland (2015).

Objective Career Success Themes	Subcategories or Measures
Research productivity	Grant funding; Number of publication and citations; Publishing in high-profile journals; Generating more postgraduate students; Launching a research programme; First/last/sole authorship
Promotion and tenure	Early promotion; Meeting requirement in research, teaching, and service; Promotion to a professor/a personal chair
Status	Disciplinary reputation; International invitation on research collaboration; Working in a reputable university; Research and teaching awards; Given departmental responsibilities
Teaching performance	High student evaluation scores; Teaching large classes
Salary	Adequate salary important, but not a key marker of success
Subjective Career Success Themes	Subcategories or Measures
Life satisfaction	Happiness; Balancing work, family and leisure; Keeping stress under control; Staying healthy
Contribution to society	Making a lasting contribution to human knowledge; Influencing people's behaviour or thinking; Connecting with/changing the local community
Freedom	To choose one's research direction; To work collectively not just individually; To focus on research; To teach in one speciality area; To do interdisciplinary work
Job satisfaction	Feeling confident as a researcher and teacher; Receiving positive feedback from students and colleagues; Maintaining balance in all academic roles; Mentoring/inspiring colleagues
Influencing students	Influencing postgraduate students' opportunities; Challenging students' thinking; 'Grandparenting' as a supervisor

Table 2.3: Synthesis of Academic Career Success Themes and Measures

Source: Sutherland (2015).

A literature review on how to succeed in academia was also conducted to reinforce Sutherland's (2015) academic success themes and ensure the consistency and relevancy of the objective and subjective success themes used in the present study. For instance, Abu Said et al. (2015) conceptualised Malaysian academic career success based on objective and subjective dimensions, including salary, the number of promotions, the number of research publications as objective indicators, and career satisfaction as a subjective indicator. Riordan and Louw-Potgieter (2011), who investigated the academics' career success model in South Africa, used both objective and subjective success indicators, inclusive of publication in a highindexed journal, research grants obtained, number of seminars attended and papers presented in an international seminar, administration responsibilities, and professional contributions to the industry and community. In comparison, Derosier et al. (2013) used five objective indicators: number of publications, number of grants awarded, number of honours or awards, number of research collaborations, and number of presentations in conferences to evaluate the success of academics in the blended learning environment. Above all, when considering the relevance of the protean career in the academic world, career progress at higher echelons within the academic discipline—lecturers, senior lecturers, associate professors, and full professors (internal employability), and cross-discipline as well as cross-boundary moves (external employability), are the major indicators of success in academia (Baruch & Hall, 2004; Baruch, 2020; Tee & Chan, 2016).

Focusing on the nature of the academic work in a knowledge-intense environment, 'research productivity' is the most cited theme attributed to academic career success (Sutherland, 2015) since the academics' status and career portfolio are largely determined by the quantity and quality of publications. Indeed, most academics may seek a career that enables them for professional development and gain recognition through research and publication, irrespective of hierarchical progression (Baruch & Hall, 2004). For subjective career success, the theme 'career satisfaction' or 'job satisfaction' is the most prominent indicators of success in academia (Sutherland, 2015).

2.6 Theoretical Underpinnings

The context of career management has changed radically over the past decade. A worthwhile career model cannot be context-specific, only relate solely to the relatively predictable business context, and applicable only to the present situation. A good model should be capable of describing the present and future changes in the career paradigm. A review from the existing literature found that very few career-related theories have emerged from the regions outside the Western context (Benson, McIntosh, Salazar, & Vaziri, 2020; Mayrhofer et al., 2016; Shen et al., 2015), particularly in Malaysia. Hence, a critical review of previous models with universal validity and application is particularly important to ensure the relevancy and generalisability of the present study.

The Social Cognitive Career Theory (SCCT; Lent, Brown, & Hackett, 1994, 2000, 2002) and the Career Self-Management Model (SCCT-CSM; Lent & Brown, 2013) were used as the theoretical underpinning to explain the conceptual framework in this study. SCCT has enough ingredients necessary to serve as a holistic model from the perspective of individual and organisation in explaining career outcomes, and this theory is empirically tested and validated in guiding future research, as recommended by researchers in career studies (Abu Said et al., 2015; Brown & Lent, 2019; Lent & Brown, 2013; Lent, Morris, Penn, & Ireland, 2019). Moreover, the researcher draws on the Career Resources Model (Hirschi, 2012; Hirschi et al., 2018) to determine the critical career resources (e.g., predictors) essential for career development in the modern context. This model presents an integrative framework of career resources that helps integrate the dispersed literature on career management, facilitating the researchers and practitioners to easily identify and evaluate important factors for career development and success in today's world of work (Hirschi et al., 2018).

2.6.1 Social Cognitive Career Theory (SCCT)

SCCT (Lent et al., 1994, 2002), derived primarily from Bandura's (1986) social cognitive theory (SCT), has received vast attention as a comprehensive conceptual framework for understanding various aspects of academic and career development (Brown & Lent, 2019; Lent & Brown, 2013). Bandura (1986), in his social cognitive theory, argued that a person is fully integrated with the

environment during his/her learning process and suggested that the person, environment, and behavioural outcomes are inseparable from each other throughout the learning process. Grounded in social cognitive theory, SCCT seeks to provide a unifying framework for explaining and predicting the mutually influencing relationship between the environment and people in shaping academic and career behaviours.

SCCT originally consists of three segmental models aimed to explain (a) the development of academic and career interests, (b) how individuals make educational and career choices, and (c) performance and persistence in educational and career context. It was later expanded to include a model of satisfaction in academic and work settings (Lent & Brown, 2006, 2008) and, most recently, a model emphasising the process of career self-management (Lent & Brown, 2013). Collectively, over the past 25 years, a considerable amount of research has accumulated advocating that SCCT offers a useful framework for explaining career interest, choice, and performance (Brown & Lent, 2019).

The central tenets of SCCT rely on a set of social cognitive constructs such as self-efficacy, outcome expectations and goals, which operate together with a variety of personal (e.g., personality, attitude, ability) and contextual (e.g., organisational supports and barriers) variables, producing a framework in the understanding of the academic and career-related outcomes (Brown & Lent, 2019). In general, self-efficacy refers to a belief about one's ability to execute behaviours to meet particular goals and succeed in different activities. Outcome expectations refer to a person's belief about the consequences of activity engagement. Goals refer to intentions to attain a particular outcome in academic and career development. These core cognitive constructs are adapted along with the personal and contextual variables to help explain and predict academic and career outcomes. Hence, SCCT existing models hypothesised that personal inputs and contextual variables expected to shape career-related outcomes (e.g., interests, choices, performance, satisfaction and self-management) directly or indirectly via socialcognitive mechanisms (self-efficacy beliefs and outcome expectations).

In the present study, the researcher reviews and adopts some common constructs in the newer career self-management model (SCCT-CSM, refer to Appendix 1), simplifies the model and provide a coherent yet parsimonious research model to predict academics' career success in the modern career context. Consistent with other SCCT models, in the SCCT-CSM model, personal inputs and contextual variables proximal to adaptive behaviour are posited to be linked to career outcomes via several routes—directly and indirectly via social cognitive constructs (e.g., self-efficacy). Another important finding in the SCCT-CSM model and some of its replication studies is the strong support for the mediating roles of self-efficacy in addition to its direct links to the career outcomes such as career decidedness (Ireland & Lent, 2018), career planning (Wendling & Sagas, 2020), retirement planning (Penn, 2019), job search intention (Kim, Kim, Lee, 2019; Lim,

Lent, & Penn, 2016), career roles management (Kim, Fouad, & Lee, 2018; Roche, Daskalova, & Brown, 2017), and workplace disclosure (Tatum, 2018).

The SCCT-CSM model was developed to predict how people adapt to managing the developmental tasks and challenges to increase career outcomes (Lent et al., 2019). The emphasis is placed on the resources, competencies, and behaviours that reinforce individuals' capacity in managing their career within the contexts of challenging environment (Coetzee & Schreuder, 2017; Pérez-López, González-López, & Rodríguez-Ariza, 2019). Specifically, this model focuses on individual agency, i.e., people, to direct their career to accomplish personal goals. The personal agency jointly operates with contextual variables to codetermine the outcomes of adaptive behaviours. Moreover, the socio-cognitive variables of self-efficacy seem to be the prominent antecedents and mediator related to career outcomes (Brown & Lent, 2017; Lent & Brown, 2013).

The complexity of the SCCT-CSM model, in conjunction with heavy replication and extension of the model, makes it challenging to draw a firm conclusion across applications (Brown & Lent, 2019). In translating this approach to the present study, the researcher simplifies the model and redefines the variables differently from previous studies, replicating the SCCT-CSM models. Using the SCCT-CSM model, the researcher determines the key predictors and underlying theoretical mechanisms of academics' career success. Five variables are identified (i.e., protean career attitude, organisational learning practices, perceived internal employability, perceived external employability and career success) to assess the hypothesised extended SCCT-CSM model in the present study. The model posits that interactions between social cognitive factors, environmental attributes and personality traits promote adaptive behaviour and influence career outcomes.

The most prominent social cognitive variable that serves as a proximal antecedent of career success is self-efficacy belief, i.e., referring to an individual's perception of his/her ability to perform a specific task necessary to bring forth the desired career outcomes (Lent & Brown, 2013). The self-efficacy belief is operationalised as perceived internal and external employability in this study. Similar to the roles of self-efficacy in the SCCT-CSM model, perceived internal employability and perceived external employability are determined as direct antecedents and mediators relating to academics' career success. Besides the notion that proactive personality is an important predictor that facilitates individuals to succeed in the career, contextual factors such as career supports and barriers are also treated as the critical components that can facilitate and/or constrain the exercise of adaptive behaviour, which are related directly and indirectly to career outcomes (Brown & Hirschi, 2013). The personality input (e.g., protean career attitude) and contextual variable (e.g., organisational learning practices) are operated in concert with cognitive variables (perceived internal and external employability) affecting the career outcomes (i.e., career success). These components of the SCCT-CSM model shed light on its applicability in explaining the conceptual framework for the present study.

2.6.2. Career Resources Model

Previous studies generally agreed that a self-directed career has gained importance and becoming more relevant for successful career management in the new career context (Haenggli & Hirschi, 2020). Accordingly, although the review of extant studies revealed various arrays of potential predictors that tap into career self-management, no consensus on what constitutes a successful career is available (Hirschi et al., 2018; Ng & Feldman, 2014). Nevertheless, identifying factors that contribute to career success remains the focal interest of researchers and HR practitioners (Hirschi et al., 2018; Weng & Zhu, 2020). Consequently, several theoretical models and empirical studies aim to investigate and validate the factors contributing to career success, producing superabundant concepts and variables as predictors of career success. Given this state of affairs, in the present study, instead of adding new constructs to the list, the researcher tries to integrate insights from different theoretical models to provide a more concise and integrative view of the key predictors of career success theoretically and empirically well established.

In this study, the researcher draws on the Career Resources Model (Hirschi, 2012; Hirschi et al., 2018) to develop more concise measures for academics' career success. This model fits well with the contemporary conceptualisations of meaningful careers that encompass key resources from personal and environmental resources. Furthermore, a growing body of research focused on career resources such as human capital, social capital, and contextual factors as the key resources in

attaining career success (Hirschi et al., 2018). In general, career resources are defined as valuable entities that can facilitate an individual to acquire valued (career) outcomes (Hobfoll et al., 2018). Hirschi's (2012) career resources model presented four critical career resources essential for career success in the modern context: human capital resources, social resources, psychological resources, and identity resources (refer to Appendix 2).

Hirschi et al. (2018) further modified the previous model by combining the psychological resources with career identity resources under the "motivational career resources" domain that closely represent career-related psychological factors. Also, social resources have been replaced by "environmental resources" that are not limited to social relations and networking and encompass organisations and other institutional supports. In line with the recent career literature that emphasised career self-management and proactive roles of self-directed career, "career management behaviours" were added as new resources that facilitate career development and success.

The new career resources framework by Hirschi et al. (2018) has identified four new categories of career success factors inclusive of (1) human capital resources (e.g., occupational expertise, job market knowledge and soft skills), (2) environmental career resources (e.g., career opportunities, organisational career support, job challenges and social career support), (3) motivational career resources (e.g., career involvement, career confidence and career clarity), and (4) career management behaviours (e.g., networking, career exploring and learning). Importantly, these four categories of career success factors, with specified 13 aspects or measures, are empirically and theoretically accepted and well established in the international career literature. This model provides a more concise and integrative view on the career success factors by integrating insights from the personal and environmental perspectives as the theoretical foundation, which is in line with the aim of the present study to consider both individual and organisation factors in predicting academics' career success.

2.6.3. Theoretical Framework

After reviewing the content in the career resources model and its relation to the underpinning theories, the SCCT-CSM model, four keys predictors of academic career success have been identified and adopted in this study. They comprised (1) organisational learning practices under the environmental career resources domain, (2) protean career attitude under the human capital domain or career management behaviour domain, (3) perceived internal employability, and (4) perceived external employability under the motivational career resources. The conceptual framework of academics' career success for the present study was developed (as shown in Figure 2.1). This theoretical framework simplifies the SCCT-CSM model, intends to offer a predictive mechanism to validate the key predictors of academics' career success adapted from the career resources model.



Figure 2.1: Theoretical Framework *Source:* Adapted from Lent & Brown (2013)

2.7 Hypotheses Development

A review of the underpinning theories and literature in the previous section offers a set of principles and concepts to develop the conceptual framework for the present study. The theoretical framework, presented in Figure 2.1, underlying the potential relationships among all variables employed in this study. In response to the research gaps and research objectives identified in the previous chapter, the relationship between the studied constructs is discussed in the following sections, followed by developing hypotheses based on the justification from the review on past literature.

2.7.1 Protean Career Attitude and Career Success

Contemporary career context implies that employees must engage in a range of career self-management activities to create career options that allow them to realise their personal career goals and ensure their employability (Cortellazzo et al., 2020). This career self-management trend has been termed as a protean career, one of the most innovative approaches capturing the current nature of careers complementary to the boundaryless career (Briscoe & Hall, 2006; Grimland, Vigoda-Gadot, & Baruch, 2012; Hall, 2004, 2013; Nimmi et al., 2020; Wong & Mohd Rasdi, 2019). Hall first proposed the protean career in 1976 but only gained wide attention in the late 1990s due to the change in career management context from traditional, organisation managed career to individual-focused, self-managed career practices.

Protean career is characterised as "a process in which the person, not the organisation, is in charge" (Hall, 2004, p. 4). Some of the basic assumptions of a protean career are that it is driven by an individual instead of an organisation, where individuals (e.g., employees) have full autonomy and responsibility in managing their career (Hall et al., 2018; Hermann et al., 2015). Second, due to the dynamic career context, continuous learning is regarded as the main strategy in managing a protean career. Protean individuals constantly equip themselves with the latest knowledge and skills required to be competitive in the job market, leading to enhanced employability and career success (Nimmi et al., 2020). Third, the protean

career focuses on psychological or subjective success rather than observable or objective career success. The intrinsic values associated with a protean career are oriented toward autonomy, meaning, and growth (Hall et al., 2018). Based on the assumptions, individuals with a strong protean mindset are responsible for managing their careers, always seeking development opportunities, and relying on their values to guide their career growth.

Protean career attitude has become one of the trending topics in career research over the past few decades (Akkermans & Kubasch, 2017; Porter, Woo, & Tak, 2016). It refers to the belief that an individual takes control of their career and transforms the career path. Protean career attitude is defined as "the extent to which an individual manages his or her career in a proactive, self-directed way driven by personal values and subjective criteria" (Waters et al., 2014, p. 405). Briscoe et al. (2006) characterised protean career attitude as "involving mobility, a more whole-life perspective, and a developmental progression (p. 31). Gubler et al. (2014) pointed out that protean career attitude is a person's attitude and mindset with agentic, protean inclinations where the combination of self-directed and value-driven attitudes explain the level of impartation on protean career orientation.

Furthermore, protean individuals tend to scan the environments and take initiatives to influence the environment to improve their current circumstances. They are highly alert to opportunities and react to them and actively engage in career development activities to enhance one's visibility and marketability that led to success in their career (Uy et al., 2015; Wiernik & Kostal, 2019). Therefore, individuals with high protean attitude tend to take greater responsibility in managing their career and take the initiative to "select, create, and influence" work situation to enhance their confidence in making career decisions and raise their level of career satisfaction and success (Chui, Li, & Ngo, 2020; Herrmann et al., 2015; Li, Ngo, & Cheung, 2019).

Protean career attitude has been characterised as self-directed and valuedriven career orientation (Briscoe & Hall, 2006), set the foundation for individual career management initiatives, and these attitudes were found associated with several career outcomes, particularly a person's psychological experience of success such as higher perceived employability (Cortellazzo et al., 2020; Lin, 2015; Tee & Chan, 2016), greater work-life balance (Direnzo et al., 2015), higher career self-efficacy (Chui et al., 2020; Li et at., 2019), career satisfaction (Herrmann et al., 2015; Zhang et al., 2015) and more favourable career success (Hall et al., 2018; Sultana & Malik, 2019). Despite the lack of attention to objective career success as an outcome of protean career attitude, some researchers (Sultana & Malik, 2019; Volmer & Spurk, 2011) found that protean career attitude also significantly related to objective career success such as higher salaries, promotions and task performance.

Applied to the academics' career context in this study, academic staff nowadays tend to be more individualistic. Academics mostly take the initiative to develop their career portfolio in research and publication, application of research grants, participation in conference and paper presentation. Moreover, academic staff tend to take more control in shaping and pursuing their career, mostly according to their values and aspirations (Baruch, 2020; Chapano, 2017). Undoubtedly, the protean career attitude has a clear relevance in academic work nature.

Past studies on academics' career management indicated that protean career attitude is one of the key predictors of career success in the academic context. The study by Tee and Chan (2016) on Malaysian academics' career model at PHEIs revealed a positive correlation between protean career attitude and academics' career success. Abu Said et al. (2015) investigate the academics' career success model at Malaysian research universities discovered that individuals with proactive behaviour take more initiatives to influence their working environment and seek opportunities of career development, leading to higher intrinsic and extrinsic career success. Similarly, Mustafa, Mohd Nor, and Omar (2019) examined the impact of protean career orientation on Sudanese academics' career success also found that protean career attitude was positively related to their career success. The study results also showed that protean career attitude could enhance the individual's psychological resources such as self-efficacy and optimism, instigating success in an academic career. To conclude, contemporary career studies have evidence that individuals with protean career attitude tend to behave more actively about their career goals and have strong insight into what they pursue in their career. Extant studies have shed light on the importance of the protean career attitude to one's career development and success in the modern work context (Bester, 2019; Cortellazzo et al., 2020; Hall et al., 2018; Redondo et al., 2019; Rodrigues et al., 2020; Sultana & Malik, 2019). This career attitude fits well in the new career context with greater job insecurity and occupational uncertainty, providing a useful theoretical backdrop for understanding individual career management practices in this study. Accordingly, the researcher hypothesises that:

H1: There is a positive relationship between a protean career attitude and academics' career success.

2.7.2 Organisational Learning Practices and Career Success

According to De Vos and Cambré (2017), careers, to a certain extent, are still managed by organisations. In many cases, organisations form the context in which career development and planning take place. Academic work takes places in a knowledge-intensive environment, where systematic and extensive learning and development programmes are required to enhance the academics' job competencies and professionalism in dealing with their career development (Khalid, 2019; Lawler, 2008). The success of HEIs is highly dependent on the people's knowledge, skills, and abilities (Baruch, 2020; Leiber, 2019; Wike & Cahyasari, 2018). Therefore, this lengthy and systematic career development plan is only available and can be conducted in HEIs with the power, resources, and information (Bratianu, 2018; Krishnan & Maheswari, 2011).

Besides command-and-control practices and addressing employees' careers from a top-down promotion system, the organisation is expected to play a supporting role to facilitate employees' career self-management by helping the employees navigate their career within, but not limited to, the current organisation boundary (De Vos & Cambré, 2017). The organisation that takes initiatives to invest in employees' development practices, makes the employees feel that they are valued by the organisation and produce higher motivation and commitment toward their performance (Akkermans et al., 2019). These supports, and developmental opportunities can enhance the employees' career competencies, thereby increase their confidence and self-efficacy in managing their careers and realising their work and career success (Akkermans & Tims, 2017; Bagdadli & Gianecchini, 2019).

Concerning human resources development practices, organisational learning practices are vital for the optimal functioning of talented people such as academics (Kumar, 2019; Ulrich, Kryscynski, Brockbank, & Ulrich, 2017). Having talented human capital is critical, but the developmental supports from the organisations are equally important to harness the capabilities of the talents to realise the opportunities (Wilhelm & Hirschi, 2019). The researcher labels the organisational career management practices in fostering continuous learning and developmental activities to enhance individual's competencies in career navigation (Bagdadli & Gianecchini, 2019; Lau, Park, & McLean, 2020; Pradhan, Jena, & Singh, 2017) as organisational learning practices, parallel with past studies, which are considered one of the key predictors on academics' career success in this study.

In examining the organisation's role in facilitating academics' career success, the learning organisation concept served as the theoretical foundation for characterising organisational learning practices (Ortenblad, 2018). As part of the resource-based view, Hannachi (2020) confirms that learning organisation adoption and the resulting organisational learning practices are critical to the performance of knowledge-intensive firms such as universities. In addition, it is often assumed that universities are or should necessarily become learning organisations (Ali, 2012; Bauman, 2005; Bratianu, 2018; Bui & Baruch, 2013; Ortenblad & Koris, 2014; Patterson, 1999); hence, the characteristics of a learning organisation are found relevant and fit well with the context of the present study. A learning organisation has been conceptualised as organisations with the capacity to learn, adapt, and change (Watkins & Marsick, 1996). Reese and Sidani (2020) conducted a series of interviews with thought leaders (e.g., Karen Watkins, Victoria Marsick, Michael Marquardt, Bob Garratt, and Peter Senge) in a learning organisation, uncover some general descriptions of learning organisation concepts, parallel with the description by Ortenblad (2018), categorised learning organisation in four main versions; learning at work, the climate of learning, organisational learning, and learning

structure. The authors testified that the learning organisation concepts revolve around the managerial approach, focused on the organisational climate that provides a greater capacity for the people and the organisation to transform. These viewpoints reflect the organisational career management practices.

Watkins and Marsick (1996) first developed a learning organisation model, the dimension of learning organisation (DLOQ), stresses that seven dimensions, i.e., creating continuous learning opportunities, promoting inquiry and dialogue, encouraging collaboration and team learning, creating systems to capture and share learning, empowering people toward a collective vision, connecting the organisation to its environment, and providing strategic leadership for learning are required capacities that facilitate organisational transformation. Sidani and Reese (2018) noted in their interview with Dr Victoria Marsick and Dr Karen Watkins that the organisational learning climate is the most critical dimension describing learning organisation. They stressed that the organisation's climate drives the learning processes to enhance the capacity of people and organisation to change and transform (Sidani & Reese, 2018). These viewpoints are relevant to reflect organisational career management that focuses on creating a supportive and developmental climate that facilitates an individual's career navigation (Clarke, 2013; De Vos & Cambré, 2017). This is in line with the contemporary view on careers as flexible and individualised. Scholars in organisational learning studies (Hannachi, 2020; Kim, 2020; Yang et al., 2004; Watkins & Kim, 2018) acknowledged that Watkins and Marsicks's model was among the few that reflect

the common aspects of the learning organisation used today across multiple sectors and industries, spanning various continents. Therefore, the DLOQ was used to characterise the organisational learning practices in this study, and it was postulated that organisational learning practices positively influences academics' career success.

Numerous career studies suggest the relationship between organisational learning practices (e.g., climate and support) toward career success. Park (2009a, 2009b), who investigated the relationship between a protean career and organisational learning practices using Watkins and Marsick's DLOQ, discovered that most of the dimensions had a significant influence on the individual protean career. Abdelhamid and Sposato (2020) found that organisational learning practices can foster workforce agility characteristics among the employees from SME in Dubai, and the agility attributes like workforce intelligence and competencies can help increase the employees' career success. Bui and Baruch (2013) suggested that universities, becoming learning organisations, not only can attract but also retain the academic workforce longer as the universities often used organisational learning practices to nurture talents and inspire them to move upward their career ladder. Tee and Chan (2016) who applied Watkins and Marsick's DLOQ to investigate the relationship between protean career attitude, organisational learning practices and academics' career success, revealed that organisational learning practices make the strongest contribution toward academic career success in Malaysia. Similarly, Arokiasamy, Marimuthu, Lai, and Balaraman (2014), and Rahman, Rahman, Ali, and Khan (2016) also reported that organisational learning practices and supports have a significant positive association with the teaching staff's career development and success in HEIs.

Furthermore, several contemporary studies (Abdelhamid & Sposato, 2020; Akkermans & Tims, 2017; Chapano, 2017; Guo et al., 2019; Singh, 2018) testified to the correlation between career competencies development and career success and concluded that competency development via organisational learning and developmental programmes showed a positive relationship with career success. It indicates that organisational learning practices offer opportunities for continuous learning could influence employees' career success by enhancing their career competencies. Therefore, the researcher hypothesises that:

H2: There is a positive relationship between organisational learning practices and academics' career success.

2.7.3 Perceived Employability and Career Success

Emerging new career patterns and the gradual erosion of job security have led to increased employability as the basic indicator for contemporary career success. Maintaining employability is the heart of the boundaryless and protean views of career management (Akkermans & Kubasch, 2017; Callanan, 2017). Employability is commonly understood as an individual's ability to get a job, retain a job, and move across different jobs or industries (Forrier et al., 2015; Rothwell, 2015). Forrier and Sels (2003) defined employability as "an individual's chance of a job in the internal and/or external labour market" (p. 106). Van der Heijde and Van der Heijden (2006) focused on occupational expertise, conceptualised employability as a process of optimising the career competencies to continuously fulfilling, acquiring, or creating works in the labour markets. Guilbert, Bernaud, Gouvernet, and Rossier (2016) presented a wider interpretation of employability, claiming that employability should "correspond to the possibility of accessing a suitable job or to remain employed in a social, economic, cultural, and technological context" (p. 79). This possibility results from interactions between the individual and contextual factors (e.g., organisational strategies and government policies). Several authors characterised employability as individual adaptability and achieving career mobility internally and externally (Coetzee & Engelbrecht, 2019; Uy et al., 2015; Waters et al., 2014).

All previously mentioned definitions implied that employability reflects a unique resource and capability that enhanced individual value in the labour market, positively associated with career successes. As stated by Bester (2019), "being employable is perceived as a form of career success in the new career context" (p. 71). Particularly, in the age of the gig economy, robots are expected to replace human labour in the future; thus, employability has been perceived as a major predictor for career success in the new world of work (Ashford, Caza, & Reid, 2018; Crews, 2016). Undoubtedly, employability can lead to employment, and "a successful career is believed to be assured by having appropriate capacities for being continuously employable in internal as well as external labour market during the person's working life" (Forrier & Sels, 2003, p. 103).

Employability research regards individuals as the centre of attention and assesses employability by considering individuals' awareness of employment opportunities (Coetzee & Engelbrecht, 2019; Forrier et al., 2018; Kirves et al., 2014; Lin, 2015; Niu et al., 2019; Vargas, Sanchez-Queija, Rothwell, & Parra, 2018). Researchers in employability suggest that employees are more likely to act upon their (subjective) perceptions of employment opportunities rather than judging the objective reality in dealing with their career in modern context (Lo Presti & Pluviano, 2016; Vanhercke, Kirves, De Cuyper, Peeters, & De White, 2015; Van Emmerik, Schreurs, De Cuyper, Jawahar, & Peeters 2012). Therefore, in the present study, employability is studied from the individuals' (e.g., the academics) perceptions concerned with getting a new job in the same organisation or a different organisation.

Extant studies on self-perceived employability are concerned with the personal assessment of one's capacity to obtain and maintain employment in the future as important for evaluations of career success (Guilbert et al., 2018; Rothwell, 2015; Rothwell & Arnold, 2007). Drawing from the conceptualisation by Rothwell and Arnold (2007), self-perceived employability can be treated as a unidimensional construct consisting of internal and external employability, or two segregated

constructs, namely, perceived internal employability and perceived external employability. Perceived internal employability is a person's belief of maintaining his employment within his current organisations, whereas perceived external employability is about acquiring future jobs in the external labour market (Forrier et al., 2015). Both perceived internal and external employability are expected to positively correlate with career success.

As discussed earlier, perceived employability is an assessment of one's ability to pursue work in the future, whereas career success refers to the current evaluation of success based on the accumulation of experience; hence, employability can serve as a proxy for career success. Perceived employability can be seen as a factor that increases the likelihood of employment success, and several recent studies have found a positive correlation between perceived employability and career success (Akkermans & Tims, 2017; Bozionelos & Bozionelos, 2015; Bozionelos et al., 2016; Niu et al., 2019; Verbruggen et al., 2015). The study by Kinnunen, Makikangas, Mauno, Siponen, and Natti (2011) on academics' career success from two Finnish universities discovered that perceived employability is positively contributing to some favourable outcomes in term of individual success in an organisation. Tee and Chan's (2016) study on academics' career success in Malaysian private universities reported that perceived employability is positively related to career success and mediated the relationship between protean career attitude and organisational learning practices toward career success. Similarly, Niu et al. (2019) investigated the impact of perceived employability on career success

among the graduate workforce, also found a positive correlation between perceived (internal) employability and career success. All the findings of previous studies testified that people with higher beliefs concerning their employability are also likely to be more confident in pursuing their career success.

Even though the distinction between perceived internal employability and perceived external employability had been widely discussed theoretically (De Cuyper & De Witte, 2011; Rothwell, Herbert, & Rothwell, 2008; Vargas et al., 2018), empirical studies in addressing the distinction between both constructs are very limited. Some researchers (Forrier et al., 2018; Nelissen et al., 2017; Vanhercke et al., 2014; Van Harten et al., 2020) examined and distinguished employees' perceptions on the internal versus the external labour market as important foci in employability research. They rightfully argue that the unidimensional nature of perceived employability does not provide much insight into the window of employment opportunities that the individual perceives and considers, either in the internal and/or external labour market.

Thus, perceived employability in this study is segregated into perceived internal employability and perceived external employability. The researcher further testifies whether both forms of employability contribute differently to academics' career success. The varying nature of both forms of employability entails different predictors, outcomes, and processes (Nimmi et al., 2020; Vargas et al., 2018). The following hypotheses are proposed to be tested in this study:

H3: There is a positive relationship between perceived internal employability and academics' career success.

H4: There is a positive relationship between perceived external employability and academics' career success.

2.7.4 Protean Career Attitude, Organisational Learning Practices and Perceived Employability

Employability is not a static measure (Clarke, 2017), and it changes over time. Particularly in today volatile business environment, skills may become obsolete while the characteristics and the demand of the labour market might change so that the person who is employable today might be unemployable in the future. Thus, maintaining skills and abilities do not guarantee secure employment. Individuals should proactively seek continuous learning and development opportunities provided by the organisation and take more responsibility in managing the ongoing employability and career progression (Coetzee & Engelbrecht, 2019; Cortellazzo et al., 2020). Indeed, employability perceptions are assumed to be formed by individual and organisation factors (Vanhercke et al., 2014). Thus, employability dynamics can only be understood by considering the interplay between individuals and organisation (Lo Presti & Elia, 2020).

Protean Career Attitude and Perceived Employability

Consistent with the idea of individualistic career management, individuals carry the most responsibility for their ongoing employability as a precondition to career success. Individual's protean characteristics serve as the important attributes to support career self-management that energise human activity focused on gaining mastery over conditions affecting one's career success and employability (Coetzee & Schreuder, 2017; Cortellazzo et al., 2020; Bozionelos & Bozionelos, 2015). This is important in the age of boundaryless and protean career since protean individuals hold more control for career growth and development. They proactively seek developmental opportunities provided by the organisations to increase their chances of progression in the organisation, increasing their internal employability.

In addition, protean individuals are more open to change and are actively engaged in networking activities; they can be expected to have higher exposure to career opportunities outside their organisation (De Vos & Soens, 2008; Guilbert et al., 2018). Lin (2015) noted that protean talents with a strong protean mindset allow them to work with numerous organisations throughout their career in transactional relationships and remain employable and valuable to current and future employers. Therefore, a protean career attitude is considered a positive psychological factor to predict psychological career success, such as perceived employability. It is reasonable to assume a direct-positive relationship between protean career attitude and perceived internal and external employability. Theoretical work examining protean career attitudes suggests a directpositive relationship between protean career attitude and perceived employability (Cortellazzo et al., 2020; Guilbert et al., 2018; Lin, 2015; Tee & Chan, 2016; Zafar, Farooq, & Quddoos, 2017). However, extant literature offered limited insight about this linkage, especially separate connections between protean career attitudes and perceived internal employability and perceived external employability is overlooked in literature (Lin, 2015; Sultana & Malik, 2020). It remains ambiguous whether protean individuals that practice career self-management more likely to enhance their employability either deeply engaged with the current organisation (e.g., internal employability) or move across the organisational boundaries and pursue a career with different organisations (e.g., external employability).

Parallel to the past studies, the protean individual often showed higher perception about one's competence and skills and are more likely to regulate their thoughts to achieve higher career progression and developmental opportunities. The value-driven and self-directed approach of high protean career attitude enables them to move across organisational boundaries and grab career opportunities outside of their working organisation (Briscoe & Hall. 2006). Previous studies on the adoption of protean career attitudes have shown that protean individuals are more likely to move across organisational boundaries. They have a high tendency to scan the environments, highly alert to the opportunities on the external labour market, and more likely to change job and move across organisational boundaries rather than remain in the internal workforce (Bozionelos & Bozionelos, 2015; Donald, Baruch, & Ashleigh, 2017; Sultana & Malik, 2020). Therefore, it is reasonable to assume that protean career attitudes are positively associated with perceived internal employability and perceived external employability. More specifically, academics with high protean career attitudes attempt to be more employable by pursuing a career outside of organisational boundaries than within the same organisation. Thus, the following hypotheses were proposed:

H5: There is a positive relationship between a protean career attitude and perceived internal employability.

H6: There is a positive relationship between a protean career attitude and perceived external employability.

Organisational Learning Practices and Perceived Employability

Although there is a general agreement that managing employability is the sole responsibility of the individuals, they alone may not sufficiently enhance their employability (Forrier et al., 2018). Even employees with high protean career attitude may not be fully convinced of their employability levels due to the fear of skill obsolescence and doubt whether their current skills and knowledge are sufficient to match the need of the external labour market (De Grip & Van Loo, 2002; Di Fabio & Cumbo, 2017; Kim, Kim, & Lee, 2015). Therefore, employees still expect employers to provide career support such as training and development

practices in exchange for the erosion of secure employment. According to Guilbert et al. (2018), employee's perception of employability is largely dependent on organisational support rather than individual proactivity since the learning and developmental practices can compensate for the lack of confidence among the employees to remain employable and the erosion of job security in the workplace. Similarly, Philippaers et al. (2017) found that employees nowadays only express commitment to work if the employer feeds their capital to reap the future benefits such as staying employable in the labour market. Thus, organisational learning practices are regarded as a managerial intervention to boost the individuals' career competencies, another major predictor of perceived employability.

Regarding the present study, the university is the place where teaching and learning activities are performed, and the university fully reflects the characteristics of a learning organisation (Bratianu, 2018; Forest, 2002). The academic position is always termed as a job with a high learning value (Peterson & Wiesenberg, 2004; Zacher et al., 2019), where a diverse array of continuous developmental interventions is required to ensure the professionalism of the staff and institutions. Several studies on academics' career development (Arokiasamy et al., 2014; Baruch, 2013, 2020; Zacher et al., 2019) stated that systematic training and development programmes organised by the academic institutions enhanced the academics' career-related self-efficacy, specifically in research and publication, teaching and administration skills, which can be viewed as a means of enhancing employability. For instance, Van der Klink, Van der Heijden, Boon, and Van Rooij (2014), who investigated the academic staff's perceived employability in Open University of the Netherlands, found formal and informal learning practices appeared to be the solid contributors to their perceived employability. Tee and Chan's (2016) study on Malaysian academics' career management revealed that organisational learning practices were the highest contributor toward academics' perceived employability and career success. Similarly, Chapano's (2017) study on academics' perceptions of career management system in tertiary institutions concluded that their perceived employability was found significantly influenced by the availability of learning and developmental programme in the institutions. Hence, it is reasonable to assume that organisational learning practices are positively related to academics' perceived employability.

In the modern career context, employees view their career as a series of learning circles and proactively seek continuous learning to minimise the discrepancy between up-to-date knowledge and their current job requirement, as well as future work roles in enhancing their marketability (De Grip & Van Loo, 2002; Lin, 2015). Employees who occupy professional jobs such as academics may fear for knowledge and skills obsolescence and apprehensive whether their current knowledge and skills could satisfy the demand from the external labour market (Kim et al., 2015; Pazy, 1996). These employees may be attached to the organisation, actively engage in self-development activities offered by the organisation to broaden their professional competence with up-to-date expertise, and report higher levels of perceived internal employability and enhance internal
career prospects within the organisation (Cerdin et al., 2020). Furthermore, Van der Heijden, Gorgievski, and De Lange (2015) stated that with the positive transfer of knowledge from organisational learning practices, employees could apply the newly learned competencies in job-related activities to deal with new tasks and cope with an ongoing change in the workplace, in turn, led to higher internal employability. Similarly, Lin (2015) found that learning and development practices are positively correlated with perceived internal and external employability and have a higher impact on perceived internal employability due to the employees are more likely to take a "developmental" approach to accumulate internal employment capabilities within an organisation before creating employment relationship beyond organisational boundaries.

Drawing on the signalling (Spence, 1973) and social exchange theories (Cropanzano & Mitchell, 2005), training and development practices from the organisation may be considered signals that the employer values about their employees, which in return, elicit a norm of reciprocity as higher levels of commitment and retention (Cropanzano, Anthony, Daniels, & Hall, 2017; Rodrigues et al., 2020). Employees are more likely to stay with their current employers if they see more career development opportunity internally (Cerdin et al., 2020). Employers typically are more willing to enhance employees' jobspecific skills instead of generic skill demanded by the labour market (Akkermans et al., 2019; Carbery & Garavan, 2005). Hence, the effects of organisational

learning practices are found more plausible to internal employability but not external employability.

While internal employability is beneficial for both employees and organisations, there is a debate that organisation learning practices might trigger employees' perceptions of external employability, resulting in a higher turnover intention (Nelissen et al., 2017; Rodrigues, 2020). Thus, the employers might face the dilemma of the benefits and the risks associated with employee (employability) development, known as employability paradox (De Cuyper & De Witte, 2011). Perhaps, employability paradox is mostly grounded in a general view of employability and dominant in the boundaryless career context, where employees are frequently engaged in job-hopping and probably less committed to one organisation. The focus in employability paradox is mostly on perceived (external) employability as a single construct, affecting employee retention or turnover but overlooking the impact on perceived internal employability, which might increase employees' attachment and commitment (Baranchenko et al., 2020). Therefore, it remains ambiguous if these employees are provided with sufficient learning and development opportunities; they see more potential for developing their ideal career internally (e.g., internal employability) or finding new employment with other employers (e.g., external employability).

This study addresses the notion of the employability paradox by exploring various forms of employability: internal and external employability. This study

provides insight into how organisational learning practices most likely benefit academics and PHEIs by enhancing their (internal and external) employability perceptions. Thus, the researcher assumes that organisational learning practices are positively associated with perceived internal employability and perceived external employability. Specifically, organisational learning practices may have a greater impact on perceived internal employability than perceived external employability. The following hypotheses are proposed:

H7: There is a positive relationship between organisational learning practices and perceived internal employability.

H8: There is a positive relationship between organisational learning practices and perceived external employability.

2.7.5 The Mediating Roles of Perceived Employability

Consistent with Lent and Brown's (2013) SCCT-CSM model, this study presumes that protean career attitude (e.g., person factor) operating with organisational learning practices (e.g., contextual factor) may significantly enhance academics' perceived internal and external employability (e.g., self-efficacy beliefs) in predicting career success (e.g., outcomes). This integrative model proposes a direct relationship between protean career attitude and organisational learning practices on academics' career success and indirect influences of protean career attitude and organisational learning practices on academics' career success via perceived internal and external employability.

This study includes perceived internal and external employability as a mediating mechanism along the direct paths to provide insights into the predictive values of the protean career attitude and organisational learning practices. Other than testifying the direct impacts of perceived internal employability and perceived external employability on career success, as stated in hypotheses 3 and 4, the researcher further examines the mediating effects and compares the mediation weights of perceived internal employability and perceived external employability. A different level of direct and mediating effects on career success is produced since perceived internal employability and perceived external employability differed in focus and scope. These are the significant research gaps to be filled in this study.

Protean Career Attitude, Perceived Employability and Career Success

In the assumption that most career and employability studies have adopted an agentic perspective in career management, the employee is in control over career-related matters (Li et al., 2019). Personal agency in employability-related matters typically associated employability with positive career outcomes, such as career success (Akkermans & Tims, 2017) and career well-being (Bester, 2019; Li, 2018). Research indicates that protean individuals may highly alert to external opportunities, actively engage in networking and more likely seek career opportunities beyond organisation boundaries (Donald et al., 2017; Sultana & Malik, 2020; Uy et al., 2015). They take most responsibility for their career progression, ready to adjust to the changes in the work environment, and highly motivated to embrace "self-knowledge, self-awareness, and personal responsibility" (Hirschi, Jaensch, & Herrmann, 2016) to ensure marketability and employability; thus reporting higher career success.

In the academic context, academics proactively participate in professional activities such as attending conferences, seminars, and workshops involving key academics and business personnel to increase their visibility and marketability, which may help them achieve higher career success (Sultana & Malik, 2019). Career attitude such as flexibility, adaptability and (pro) activeness possess by protean persons may consider the common characteristics that facilitate internal and external marketability and able to enhance future job prospects, leads to job satisfaction and career success (Clarke, 2017; Fugate, Kinicki, & Ashfort, 2004). Eby, Butts, and Lockwood (2003) demonstrated that internal and external marketability is positively related to perceived career success. They found that protean individuals who are flexible and adaptable to new experiences are more likely to grow in the ever-changing environment. These individuals have strong preferences to build networks inside and outside the organisation and have access to valuable social resources, leading to a higher level of career success.

Although perceived internal employability and perceived external employability might share common contribution toward career success, most current works (Direnzo et al., 2015; Hall et al., 2018; Horváth, 2017; Nimmi et al., 2020) argued that in the age of boundaryless and protean career, employees carry most responsibility for being employable. These employees are not willing to be bounded in a single organisation; rather, they are more likely to move across organisational boundaries and embrace the greater inter-firm transition to assure high marketability or employability in the external workforce rather than in the internal workforce (Lin, 2015) to determine their career success. The study by Kim et al. (2019) on the relationships between job search self-efficacy and its relevant antecedents and behavioural outcomes using the SCCT-CSM model revealed that proactive personality (the antecedent variables) and career wellbeing (the consequence variable) had consistently strong relations with job search selfefficacy, in this case, perceived employability.

Therefore, it is reasonable to assume that perceived internal employability and perceived external employability might mediate the relationship between protean career attitude and career success. More specifically, academics with high protean career attitudes attempt to perceive having more external (employability) employment opportunities to guide their career success rather than stay with the current institution and build their career within a single institution. Accordingly, the researcher hypothesises that: H9: Perceived internal employability mediates the relationship between a protean career attitude and academics' career success.

H10: Perceived external employability mediates the relationship between a protean career attitude and academics' career success.

Organisational Learning Practices, Perceived Employability and Career Success

Due to the current economic difficulties and job insecurity, organisations are increasingly focusing on managing and stimulating their employees' employability instead of employment security by offering more career development opportunities with the expectation of a return in the form of increased employee commitment, improved job performance, and ultimately increased productivity (Cerdin et al., 2020; De Cuyper et al., 2014). Employees with greater employability are more likely to experience a higher level of career satisfaction and success (Bester, 2019; Gowan, 2012). Hence, activities such as organisational learning practices that could improve one's competencies should also enhance perceived employability (De Vos et al., 2011; Froehlich, Beausaert, & Segers, 2015; Wittekind et al., 2010). Although previously self-perceived employability was positively associated with career success (Akkermans & Tims, 2017; Bozionelos & Bozionelos, 2015; Bozionelos et al., 2016; Verbruggen et al., 2015), probably under the new psychological contract, employees view employability as a key success factor in navigating the new career landscape (Bester, 2019; Guibert et al., 2018).

Employees who saw many opportunities available in the internal and external labour market reported higher levels of career success.

To date, empirical research examining the impact of organisational learning practices on career success via perceived employability observed a positive association between organisational learning practices and career success, as well as a significant mediating effect of perceived employability. A survey conducted by De Vos et al. (2011) on 561 employees in a financial institution in Belgium found that perceived support for competency development (e.g., organisational learning practices) was positively associated with employees' perceived employability. Similarly, perceived employability was positively related to career success. A full mediation effect of perceived employability was found for the relationship between perceived competency development practices and career success. Tee and Chan (2016), who explored the variables influencing Malaysian academic staff's career success, reported a full mediation effect of perceived employability on the relationship between organisational learning practices and academics' career success. Akkermans et al. (2019), who investigated the relationship between human resources management practices and employees' commitment, also found that perceived internal and external employability might be the explanatory (mediating) mechanism in the HRM practices—outcome relationship. Thus, in this study, the researcher sees perceived internal employability and perceived external employability as the mediating mechanisms between organisational learning practices and academics' career success.

The human capital theory (Becker, 1993) suggests that investing in employees' skills and abilities could enhance the employees' value in the marketplace, which significantly predicts employees' psychological well-being (e.g., career success). Several studies support that training and development practices could enhance employees' job-specific knowledge and skills and help them to perform their current jobs effectively, leading to a higher level of internal mobility (Aguinis & Kraiger, 2009; Cerdin et al., 2020; Philippaers et al., 2017) and manifested higher levels of career success. Employees who perceived an organisation that provided them with enough training and development opportunities are more likely to stay and grow within the company instead of seeking job opportunities outside the labour market (Cerdin et al., 2020; Lim, Mathis & Jackson, 2016). These employees are more likely to attach within the organisation to capture the opportunities of self-development offers by the organisation and more likely to pursue their career within the organisation.

Building on the career competencies framework, Lin (2015) argues that organisational learning practices may influence perceived internal employability than external employability. Lin (2015) found that employees are more likely to take a "developmental" approach to accumulate internal employment capabilities within an organisation before creating employment relationship beyond organisational boundaries in their career path. According to Forrier et al. (2015), employees may feel that occupational expertise transferred from organisational learning practices is part of their movement capital that can add to their functionality value for their current employer. This could enhance their perceived internal career opportunities and access a broader range of internal career success or options. Cerdin et al. (2020) reported that employee's perception of training and developmental opportunities provides signals to assure employees that they are valued by the organisation and indicate the availability of many internal job opportunities in the organisation. Employees who perceived better job opportunities on the internal labour market may reinforce their perceived internal career prospects and more likely align their career goals and develop their career potential.

Meanwhile, most employers are reluctant to invest in developing employees' skills and knowledge beyond their current job requirement, particularly when strengthening employees' profiles will make them more attractive and demanded on the external labour market (Van den Broeck et al., 2014). Employers may undertake actions to increase employees' perceived internal employability such as fostering internal mobility and making employees feel more confident about future internal employment opportunities (Nelissen et al., 2016) to ensure that the employees can realise their career goals within the current organisation. This might result in a higher career success within the organisation. Building on these theoretical predictions, the researcher assumes that perceived internal employability and perceived external employability might mediate the relationship between organisational learning practices attempt to foster more internal employability

perceptions compare to the perception of external employability in guiding academics' career success. Accordingly, the researcher hypothesises that:

H11: Perceived internal employability mediates the relationship between organisational learning practices and academics' career success.

H12: Perceived external employability mediates the relationship between organisational learning practices and academics' career success.

2.8 Conceptual Framework

In the present study, protean career attitude, organisational learning practices, perceived internal employability and perceived external employability are assumed as the key predictors for academics' career success. Career success, inclusive of objective and subjective measures, serves as the dependent variable. Protean career attitude as the independent variable conceptualised as self-directed and value-driven career behaviours. Past studies suggested that protean individuals tend to see more employment opportunities in the external labour market and pursue their success beyond the organisational boundary (Akkermans & Tims, 2017; Eby et al., 2003; Lin, 2015).

On the other hand, as another independent variable, organisational learning practices aim to enhance individuals perceived internal employability than perceived external employability in guiding their career path and success within the current organisation. Perceived employability, as another influential factor of career success in line with the modern career context, was partitioned into perceived internal employability and perceived external employability, which is included as the predictors as well as mediators for academics' career success.

The researcher took a convergence approach by simultaneously studying the direct and indirect relationship of these four variables with academics' career success. The conceptual framework is then developed and shown in Figure 2.



*H9, H10, H11, H12: Mediating effects

Figure 2.2: Conceptual Framework of Academics' Career Success

2.9 Research Hypotheses

With reference to the above conceptual framework (Figure 2.2), the hypotheses of the study are summarised as follows:

H1: There is a positive relationship between a protean career attitude and academics' career success.

H2: There is a positive relationship between organisational learning practices and academics' career success.

H3: There is a positive relationship between perceived internal employability and academics' career success.

H4: There is a positive relationship between perceived external employability and academics' career success.

H5: There is a positive relationship between a protean career attitude and perceived internal employability.

H6: There is a positive relationship between a protean career attitude and perceived external employability.

H7: There is a positive relationship between organisational learning practices and perceived internal employability.

H8: There is a positive relationship between organisational learning practices and perceived external employability.

H9 Perceived internal employability mediates the relationship between a protean career attitude and academics' career success.

H10: Perceived external employability mediates the relationship between a protean career attitude and academics' career success.

H11: Perceived internal employability mediates the relationship between organisational learning practices and academics' career success.

H12: Perceived external employability mediates the relationship between organisational learning practices and academics' career success.

2.10 Chapter Summary

This chapter has critically reviewed the literature relevant to the research topic, specifically in justifying the adoption of the SCCT-CSM model by Lent and Brown as the theory underpinning the development of the conceptual framework for the present study. The SCCT-CSM has been repeatedly demonstrated to predict career behaviour due to the interaction between personal, contextual, and social-cognitive constructs. It has enough ingredients to serve as an integrative model among other career models and has been empirically tested in guiding other research in career studies. Furthermore, the present study also adopted the career resources model (Hirschi, 2012; Hirschi et al., 2018) to determine the key predictors (e.g., career resources) which are relevant to be used in the context of academics' career success. After a comprehensive literature review, this chapter presents the formulation of hypotheses to be tested for validating the proposed conceptual framework, as presented in Figure 2.2.

The research methodology and analytical approach used for empirical validation of the research model and research hypotheses will be discussed in the next chapter.

CHAPTER 3

RESEARCH METHODOLOGY

3.1 Introduction

The scientific research method is a set of standardised techniques for knowledge building, inclusive of a process to validate observations, to interpret results, and to generalise those results. These processes allow the researcher to independently test pre-existing theories and prior findings, and subject them for further modifications or enhancement (Bhattacherjee, 2012). As far as the nature of research is concerned, this study adopted Saunders, Lewis, and Thornhill's (2012) Research Onion Framework (refer to Appendix 3) to guide the overall research design in a coherent manner.

This chapter begins with the elaboration and justification of the research paradigm and methodology used in this study. Following the conceptual framework and hypotheses presented in Chapter 2, this chapter further explains the research design, which includes the sampling procedure, survey design with detailed explanation of the measures used for the identified constructs, data collection plan, analytical approach, and the acknowledged steps of the statistical validation process using Partial Least Squares Structural Equation Modeling (PLS-SEM).

3.2 Research Design

Bhattacherjee (2012) described research design as a comprehensive plan or 'blueprint' for empirical research, aimed to answer specific research questions or to test specific research hypotheses through the process of (1) data collection, (2) instrument development, and (3) sampling. Saunders et al. (2012) presented the research onion framework to illustrate the multi-stage (layers) decisions that the researcher needs to address in designing research. These layers comprise an overview of research philosophies and research approaches, followed by methodological choices, research strategies, time horizons, and research techniques and procedures. All these aspects are essential in developing a coherent and appropriate research design. In view of that, all the above-mentioned aspects for the present study were discussed and determined as follows.

3.2.1 Research Philosophy

Research philosophy reflects the researcher's view of the nature of knowledge. Crucially, the research philosophy adopted by the researcher underpins the overall research strategy and the methodology that guides how the research is conducted. Saunders and colleagues (2012) claimed that there are four continua of philosophy that can be adopted by the researcher, namely positivism, realism, interpretivism, and pragmatism. The philosophy taken for the present study was

positivism. The decision to adopt positivism was based on the rationale that 'only observable phenomena can produce credible data and acceptable knowledge'.

Positivism research uses theories to explain and/or predict social phenomena and applies logical reasoning to explain the causal relationships between variables to create law-like generalisations by linking them to deductive theory (Collis & Hussey, 2014). Since positivism assumes that social phenomena are objective and can be measured, it is associated with the quantitative method of analysis. In line with this, the present study adapted the SCCT-CSM model and the career resources model to develop the conceptual model and explain the causal relationships between the identified constructs. Quantitative research via survey was used to address the research objectives through empirical assessment, and the data collected was analysed using statistical tools such as the Statistical Package for the Social Sciences (SPSS) and SmartPLS.

The alternatives to positivism are realism, interpretivism, and pragmatism, but these philosophies did not fit with the requirements of the present study. Compared to positivists who undertake a value-free manner in the research process, realists tend to be value-laden and biased by their worldviews and cultural experience (Scotland, 2012). On the other hand, interpretivism advocates that social reality is not objective but highly subjective and shaped by people's perceptions (Creswell, 2014), where 'social actors' play a significant role in interpretivist research. As opposed to positivists who adopt logical reasoning and quantitative methods, interpretivists adopt qualitative methods and "seek to describe, translate and interpret the roles of social actors" (Collins & Hussey, 2014, p. 52). Finally, pragmatism asserts that there are many ways of interpreting the world and no single point of view can paint the entire picture, which did not fit the goals of the present study.

3.2.2. Research Approach

Research always involves the use of theories. Theoretical study allows researchers to familiarise themselves with the area of study and draft research questions to guide research design (Haugh, 2012; Johnston, 2014). How theory is tested and expanded raises an important question concerning the design of research. Saunders et al. (2012) classified research approaches as deductive or inductive. The present study employed the deductive approach, designed to test the application of the SCCT-CSM model and other related career theories to provide insight into academics' career management.

Using the deductive approach, the present study sought to explain the causal relationships among the variables by developing a number of hypotheses and using a highly structured methodology through the execution of primary research (e.g. survey using a structured questionnaire) to test the hypotheses and verify the present career success model. Deductive research was used since this approach fit well with the positivism research philosophy, which is based on logical reasoning to explain career phenomena. Indeed, deductive research allows generalisation, wherein particular instances are deduced from general inferences.

Alternatively, inductive research, also known as the theory-building approach, can be used if researchers wish to explore a phenomenon and build a theory. The inductive approach is more concerned with the context where events take place and only requires a small sample of subjects. This approach is more likely to work with a qualitative research design to establish different views of phenomena (Thomas, 2003).

3.2.3 Methodological Choices

Guided by the research philosophy and research approach, the researcher had to make a methodological choice on whether to use either a single quantitative or qualitative method (mono method), multiple quantitative or qualitative methods, or a mixture of both quantitative and qualitative methods. Quantitative research, according to Zikmund, Quinlan, Griffin, Babin, and Carr (2019), is an approach that achieves research objectives through an empirical assessment involving numerical measurement and analysis. Quantitative methods are normally associated with positivism and the use of highly structured data collection and analysis methods designed to ensure the objectivity, generalisability, and reliability of the study. Alternatively, qualitative research is aimed to fulfill research objectives by allowing the researcher to provide elaborate interpretations of phenomena without depending on numerical measurements (Zikmund et al., 2019). Qualitative research is normally associated with interpretivism, where researchers attempt to make sense of subjective constructed meanings about the phenomenon.

Quantitative research was used in the present study, consistent with the positivism research philosophy and the deductive research approach. Accordingly, survey research was conducted quantitatively using questionnaires for academic staff to test and verify the career success model in the present study. Besides, under the positivist paradigm, it is essential that research data are highly specific and precise, and that the data collected are measured numerically and analysed using a range of statistical techniques to ensure the accuracy and generalisability of the findings (Alharahsheh & Pius, 2020). In addition, Bryman (2016) argued that quantitative research emphasises numbers and figures in the collection and analysis of data using statistical analysis tools such as SPSS and SmartPLS, which reduces the time and effort the researcher invests in describing and interpreting results (Creswell, 2014). Furthermore, the quantitative research approach relies on larger sample size and follows clear guidelines and objectives, enabling the results to be generalised (Daniel, 2016).

3.2.4 Research Strategies

Denzin and Lincoln (2005) defined research strategy as an action plan of how the researcher answers his/her research question, links methodological choices with research philosophy, and subsequently decides on the data collection and analysis methods. Researchers can use one or more strategies within their research design but need to ensure a reasonable level of coherence throughout the design to answer the research questions and meet the objectives accordingly. The available alternatives include experiment, survey, archival research, case study, ethnography, action research, grounded theory, and narrative inquiry (Saunders et al., 2012).

The research strategy used in the present study was a survey approach with a self-administered questionnaire. The survey is a non-experimental design employed to collect and analyse quantitative data using descriptive and inferential analysis. The choice of the survey strategy in the present study was due to its connection to deductive research as well as its common utilisation in business and social sciences research. The survey is also considered a quick, inexpensive, and efficient means of data collection, which allows the collection of standardised data from a sizable population in a highly economical and easy way (Creswell & Hirose, 2019). In addition, using a survey offers the researcher more control over the research process, while a survey administered to a random sample from the field can enhance the generalisability of findings to the population. Further details regarding the survey design used in the present study are discussed in Section 3.4.

3.2.5 Time Horizon

A cross-sectional study is a methodology designed to study a phenomenon at a particular time (Saunders et al., 2012). In a cross-sectional study, data is collected at a single point of time. Conversely, if the researcher resolves a research problem by investigating the same variables or group of people several times over the period of study, or the data is collected for an extended period of time, the research is called longitudinal.

A cross-sectional time horizon was utilised in the present study since the focus of the research was the current labour market situation and data collection was conducted over a period of two to three months. A cross-sectional study was suitable due to time constraints and limited resources in the present study as well. It is inexpensive and simultaneous, where data is collected once over a short period of time before being analysed and interpreted. This further avoids the problem of change in the data due to the passage of time.

3.2.6 Data Collection Techniques and Analysis Procedures

Decisions on the data collection techniques and analysis procedures are made in consideration of the interrelationships between the research philosophy, research approach, research strategy, and the time horizon, so that the overall research design is both appropriate and coherent. Since the present study adopted was positivist, deductive, and quantitative, data was collected using a survey with a self-administered questionnaire, and subsequently analysed using statistical analysis. Further details on data collection and data analysis are discussed in Sections 3.7 and 3.8.

Drawing on Saunders et al.'s (2012) Research Onion Framework, a summary of the research design used in the present study is presented in Table 3.1.

 Table 3.1: Summary of Research Design

Layers of Research Onion Framework	Choices for Research Design in the Present Study
Research philosophy : positivism, realism, interpretivism or pragmatism.	Positivism
Research approach : deduction, induction, or abduction.	Deductive
Methodological choices : quantitative, qualitative, or mixed methods	Quantitative (mono method)
Strategies : experiment, survey, archival research, case study, ethnography, action research, grounded theory, or narrative inquiry.	Survey using a self-administered questionnaire
Time horizon : cross-sectional or longitudinal	Cross-sectional study
Data collection and data analysis	Data collection using self- administered questionnaires via Drop- off-Pick-up method.
	Statistical validation and hypotheses testing using PLS-SEM.

3.3 Unit of Analysis and Sampling Procedures

The private higher education sector contributed almost 50% of total student enrolment to the Malaysian higher education system in 2019 and is a main contributor of Malaysia's economic growth. The fierce competition due to globalisation and the commodification of higher education (Munusamy & Hashim, 2019) provides strong motivation for individuals' self-managed career (e.g., protean career). Moreover, HEIs mostly involve in teaching and research activities, and so are assumed to possess a well-developed learning and development system through various organisational learning practices. Parallel with the present study's aim to investigate the integrated effects of both personal and organisational factors on academics' career success, the existence of individuals' protean career attitude and organisational learning practices were the main reasons for choosing PHEIs as the participating organisations in this study.

As of 2019, the total number of academic staff in Malaysian HEIs (private and public) was 67,616, inclusive of 41,655 staff from public institutions and 25,961 staff from private institutions (Ministry of Higher Education Malaysia, 2020). The private higher education sector in Malaysia consists of private universities, private university-colleges, foreign university branch campuses, and private colleges. The education services provided by universities and university-colleges are more comprehensive than colleges, comprising undergraduate and postgraduate studies. Hence, the sampling frame for the present study only accounted for academics from private universities and private university-colleges. Moreover, sample units from private universities and university-colleges were more likely to reflect the nature of academics' work and career that includes not only teaching activities but also research and publication, student supervision and mentoring, and other professional contributions to the community.

The researcher picked respondents from institutions registered with SETARA-2017. SETARA-2017 is a credential rating standard used to measure the quality of teaching and learning of participating universities in Malaysia based on four main criteria in the MQA framework: general institutional profile, teaching and learning, research capacity, and services and income generation (Ministry of Education Malaysia, 2017). The assessment standard of SETARA-2017 sets the reference point for academic and institutional excellence that reflects the standards of tertiary education. It was thus justifiable to pick respondents from the institutions awarded SETARA's 4-star and above recognition.

A total of 71 out of 105 Malaysian universities and university-colleges participated in the 2017 rating exercise. Out of the 71 institutions, 58 (public and private) institutions managed to achieve a 4-star (very good) rating and above. Eight universities were awarded the 6-star (outstanding) rating, 21 universities and university-colleges managed to gain a 5-star (excellent) rating, and 29 institutions achieved 4-star (very good) status (refer to Appendix 4).

3.3.1 Sampling Procedures

In the present study, quota sampling followed by simple random sampling were used to select sampling units from the 36 private universities and university-colleges with SETARA's 4-star rating and above. Quota sampling was employed when the researcher created a quota based on the academic staff's highest qualification level and divided the sampling units into three subgroups: (1) Bachelor's degree, (2) Master's degree, and (3) Doctoral degree. Simple random sampling was then performed to draw subsamples within each subgroup to ensure that the sample accurately represented the population according to the criteria used for stratification.

As of 2018, the total number of Malaysian academic staff in private universities and university-colleges by highest qualification was 14,716, inclusive of 4,426 staff (30%) with a Doctoral degree, 7,970 staff (54%) with a Master's degree, and 2,320 staff (16%) with a Bachelor's degree or equivalent (Ministry of Higher Education Malaysia, 2018). Following this, the researcher determined the appropriate sample size while maintaining the proportion evaluated in the previous step, based on the respondents' highest academic qualification. Accordingly, based on the suggested sample size of 300 respondents (refer to 3.3.2 Sample Size), approximately 90 respondents should have a Doctoral degree, 162 respondents should have a Master's degree, and 48 respondents should have a Bachelor's degree. Details of the sampling procedure are illustrated in Figure 3.1.



Figure 3.1: Sampling Procedure

3.3.2 Sample Size

According to Sekaran and Bougie (2016), in general, a sample size larger than 30 and less than 500 is appropriate for most research. Scholars believe that the more sample units obtained, the better the statistical power of the research. However, indefinite data collection must be weighed against available resources. The researcher applied some rules of thumb for sampling to justify the sample size for the present study. The '10 times rule' (Hair, Hult, Ringle, & Sarstedt, 2017) suggests that sample size (1) should be at least 10 times the largest number of formative indicators used to measure a single construct, or (2) 10 times the largest number of structural paths directed at a particular construct in the structural model. Although the '10 times rule' allows researchers to fulfil the minimum sample size requirement for PLS-SEM, researchers are urged to perform a power analysis to verify statistical power and determine the sample size in consideration of the model's structure (maximum number of independent variables), expected effect size of the population, and significance level of the test (Cohen, 1988; Hair et al., 2017).

In the present study, the researcher used Cohen's formula to estimate the sample size by (1) fixing the commonly used level of statistical power at 80%, (2) fixing the statistical significance level at an alpha of 0.05, and (3) defining a medium effect size of 0.15 as suggested by Cohen (1992), who stated that a medium effect is desirable as it would likely be 'visible to the naked eye of a careful

observer'. A statistical power analysis using GPower 3.1.9.4 software was performed for sample size estimation following the above criteria, yielding an estimated sample size of 129 for this study (refer to Appendix 5). Moreover, Ringle et al.'s (2020) review of 77 HRM studies over the past 30 years that used PLS-SEM also found that a mean sample size of 142.5 is sufficient in most HRM studies, which is somewhat lower than other business research disciplines such as marketing (mean = 211.3), operations management (mean = 238.1), and strategic management (mean = 154.9).

To avoid critique on the justification of using PLS-SEM mainly for its ability to handle a small sample size (Rigdon, 2016), the researcher fixed the sample size of 300 for the present study instead of the smaller sample size of 129 as calculated in the GPower analysis. With a larger sample size, the researcher was able to detect the effects of phenomenon more accurately and make conclusive inferences from the sample statistics about the population. Additionally, the sample size of 300 was both adequate and manageable.

Using quota sampling criteria according to academics' higher education qualification, the sample sizes aimed to be drawn from each subgroup were approximately 90 respondents (30%) with a Doctoral degree, 162 respondents (54%) with a Master's degree, and 48 respondents (26%) with a Bachelor's degree or equivalent.

3.4 Survey Design

The survey method was used in the present study, consistent with deductive and positivist research. A self-administered, hand-distributed questionnaire was employed to collect respondents' answers on the research topic. In the present study, five latent constructs were proposed and the relationships among them were tested to answer the research questions. Thus, these constructs had to be measured and validated prior to data collection and analysis. The measurement items for these constructs were mainly adapted from previous tested and validated scales in the extant literature on career studies, employability, organisational learning, and protean career. Some previous scales or instruments were modified in line with the context of this study.

The Likert scale was used for the survey items related to the constructs. The Likert scale is one of the most frequently used psychometric tools in social sciences research, particularly in measuring attitudes, preferences, and subjective perceptions (Croasmun & Ostrom, 2011; Joshi, Kale, Chandel, & Pal, 2015). A five-point Likert scale was used in this study because it has been recognised as the most common measurement scale in social science research due to its advantage in reducing respondents' frustration while engendering a higher response rate and response quality. Moreover, a five-point Likert scale has a clear middle point which allows respondents to easily mark their level of agreement to a question (Dawes, 2012).

3.4.1 Pre-test and Pilot Study

Since all items were adapted from past studies, they were pre-tested to ensure the questions worked accurately in a different research setting with new respondents (Kumar, Talib, & Ramayah, 2017). Pre-testing was done with a team of experts and experienced researchers familiar with questionnaire design in the field related to the present study to validate the content of the questionnaire. As suggested by Presser and Blair (1994), expert review is an effective pre-testing tool to reveal problematic linguistic structures in survey questions and other potential measurement errors before questionnaires are distributed. Since only a few expert reviewers are required to validate a questionnaire (Olson, 2010; Presser & Blair, 1994), five expert reviewers with profound academic and research background in sociopsychology, behavioural psychology, and related fields were appointed to evaluate the questionnaire using a standardised evaluation form provided by the researcher. To minimise variation in the experts' background characteristics, all reviewers had to have at least five years of research experience and hold an academic post in a HEI. These experts were asked to conduct their review independently, and the identities of reviewers were not revealed to each other. The reviewers were asked to evaluate all questions and provide detailed written comments and modifications (if any) in the Questionnaire Evaluation Form (refer to Appendix 6).

Based on their suggestions, minor revisions were made to the questions to enhance their clarity. For example, some reviewers suggested combining the Bachelor's and Diploma degrees into one option instead of two, since the lowest qualification for academic work nowadays is a Bachelor's degree and above. Very few programmes still employ academics with a Diploma qualification. Besides, the reviewers also suggested modifying the measurement scale from a six-point to a five-point Likert scale, since the latter has a clear middle point which allows respondents to easily indicate their level of agreement to a question. To remain consistent throughout the questionnaire, the term 'organisation' was also recommended to be used to represent the HEI, so the word 'company' in Section B was replaced with 'organisation'. Overall, all the reviewers were satisfied with the questions and only recommended minor spelling and grammar-related amendments.

Once the survey questions were pre-tested and modified, a pilot study was conducted with a group of 30 lecturers from private universities. Although there are no specific rules for the sample size of a pilot study, the researcher followed several suggestions from past literature to determine the respondents for the pilot study. To be sufficient for a pilot study, Wills (2005) suggest five to 15 respondents and Perneger, Courvoisier, Hudelson, and Gayet-Ageron (2015) suggest 30 respondents, while most researchers recommend 10% of the actual sample units required (Memon et al., 2018). Practically, the sample size for a pilot study should be decided based on the complexity of the questionnaire, as a long and complex questionnaire might require a larger pilot sample than a simple and short questionnaire (Shelby, Hunt, Sparkman, & Wilcox, 1982).

Accordingly, 30 respondents (i.e., 10% of the sampling units) were selected for the pilot study. Through this pilot study, the researcher was able to ensure that (a) the wordings of the questions were correct; (b) the sequence of the questions were correct; (c) the respondents clearly understood all the questions; (d) the time taken for completing the questionnaire was reasonable; and (e) the instructions were clear and adequate (Kumar et al., 2017). The average time taken to answer all the questions was approximately 12 to 15 minutes during the pilot study. This length of time was considered acceptable and justifiable since past studies have found that thirteen minutes or less (Fan & Yan, 2010) or fifteen minutes or less (Saleh & Bista, 2017) is an ideal length of time to obtain a good response rate. Also, the researcher informed the participants in the invitation letter that the survey would take approximately 10 to 15 minutes to complete, so that the participants were aware of the time they had to spend on the survey in advance.

3.5 Measurements of the Variables

Most items used to measure the identified constructs were derived and adapted from past research, with some modifications upon suggestions from experts and participants during pre-testing and pilot testing. Chapter Two presented a comprehensive review of the literature and conceptualisations of the constructs used in the present study. As suggested by Hair, Black, Babin, Anderson, and Tatham (2010), the adoption of existing variables from prior literature can further enhance the reliability and validity of construct measurements. The instruments used to measure each construct are discussed in the following section.

3.5.1 Protean Career Attitude

Protean career attitude was measured using the Protean Career Attitude Scale (PCAS) developed by Briscoe and Hall (2005). Briscoe and Hall (2005, 2006) conceptualised the protean career attitude as having both value-driven and selfdirected attitudes towards career management. That is, individuals holding a protean career attitude are driven by their own values to guide their career (valuedriven) and are more independent in managing their own career (self-directed). Conversely, individuals with a low protean career attitude would depend on external standards to guide their career and are more likely to look for external assistance in career management. The PCAS consists of 14 items, with eight reflecting the self-directed career attitude and six reflecting the value-driven attitude. A sample item of the self-directed career attitude is "I am responsible for my own success and failure in my career", whereas a sample item of the valuedriven career attitude is "I navigate my own career, based on my personal priorities, as opposed to my employer's priorities". All items were rated on a five-point Likert scale from '1 = to little or no extent' to '5 = to a great extent'.
The PCAS has been tested and validated during its construction. All the items that make up the measure of protean career attitude were treated in the reflective mode, as indicated in Table 3.2.

 Table 3.2: Items for Protean Career Attitude

Code	Measure – Reflective (Five-point Likert Scale: 1-to little or no extent to 5-to great extent)				
PCA1	When development opportunities have not been offered by my organisation, I've sought them out on my own.				
PCA2	I am responsible for my success or failure in my career.				
PCA3	Overall, I have a very independent, self-directed career.				
PCA4	Freedom to choose my own career path is one of my most important values.				
PCA5	I am in charge of my own career.				
PCA6	Ultimately, I depend on myself to move my career forward.				
PCA7	Where my career is concerned, I am very much "my own person."				
PCA8	In the past, I have relied more on myself than others to find a new job.				
PCA9	I navigate my own career, based on my personal priorities, as opposed to my employer's priorities.				
PCA10	It doesn't matter much to me how other people evaluate the choices I make in my career.				
PCA11	What's most important to me is how I feel about my career success, not how other people feel about it.				
PCA12	I'll follow my own conscience if my organisation asks me to do something that goes against my values.				
PCA13	What I think about what is right in my career is more important to me than what my organisation thinks.				
PCA14	In the past, I have sided with my own values when the organisation has asked me to do something I don't agree with.				

Note. The measurement scales were adapted from Briscoe and Hall (2005)

3.5.2 Organisational Learning Practices

This study adapted the short version of the learning organisation questionnaire (DLOQ) by Yang et al. (2004) to assess organisational learning practices. The original DLOQ was developed by Watkins and Marsick (1997) with 43 items measuring learning culture and practices in seven dimensions: (1) continuous learning, (2) dialogue and inquiry, (3) team learning, (4) empowerment, (5) embedded system, (6) system connection, and (7) strategic leadership to encourage learning. Yang (2003) modified and reduced the items from the original 43 to a shorter version with 21 items, comprising three questions per dimension for the seven dimensions. A sample item of continuous learning is "In my organisation, people are given time to support learning". A sample item of promotion of dialogue and inquiry is "In my organisation, when people state their view, they also ask others' opinion". A sample item of encouraging team learning is "In my organisation, teams have the freedom to adapt their goal as needed". A sample item of embedded system is "My organisation creates systems to measure gaps between current and expected". A sample item of empowering is "My organisation gives people control over the resources they need to accomplish their work". A sample item of system connection is "My organisation works together with outside community to meet mutual needs", and a sample item of strategic leadership is "In my organisation, leaders will mentor and coach those they lead". This instrument has been tested, validated, and used in various settings and on participants worldwide. The new version of the DLOQ is also recommended for scholars who

wish to examine the theoretical relationship between learning cultures and practices and other variables (Yang, 2003). Thus, it is reasonable to assume that DLOQ was applicable in the present study.

However, using a large number of formative indicators to measure a single construct is likely to cause a nonsignificant outer weight for the formative construct, since only a limited number of indicators are required to retain a significant weight for a formative measurement. To deal with the potential impact of the large number of indicators, Hair, Sarstedt, Ringle, and Gudergan (2018) suggested grouping the indicators into distinct constructs with reference to theoretical perspectives. Consistently, Hannachi's (2020) study on empirical modelling for the DLOQ found that a second-order construct of reflective-formative nature is the most valid approach to conceptualise organisational learning practices. Accordingly, a reflective-formative hierarchical model (Becker, Klein, & Wetzels, 2012) was created to measure this construct. The higher-order component of organisational learning practices was then formed by the reflectively measured lower-order components of (1) continuous learning, (2) dialogue and inquiry, (3) team learning, (4) embedding system, (5) empowerment, (6) system connection, and (7) strategic leadership. In addition, a global measure was added for the purpose of assessing collinearity issues in a formative model. A five-point Likert scale ranging from '1 = strongly disagree' to 5 = strongly agree' was used to rate the items of the DLOQ. All these items are presented in Table 3.3.

Code	Measure – Reflective-Formative Higher-order
	(Five-point Likert Scale: 1-strongly disagree to 5-strongly agree)
OLP1	In my organisation, people help each other to learn
OLP2	In my organisation, people are given time to support learning.
OLP3	In my organisation, people are rewarded for learning.
OLP4	In my organisation, people give open and honest feedback to each other.
OLP5	In my organisation, when people state their view, they also ask others' opinion.
OLP6	In my organisation, people spend time building trust with each other.
OLP7	In my organisation, teams have the freedom to adapt their goal as needed.
OLP8	In my organisation, teams revise their thinking as a result of group discussion.
OLP9	In my organisation, teams are confident that the organisation will act on their recommendation.
OLP10	My organisation creates systems to measure gaps between current and expected performance.
OLP11	My organisation makes its lessons learned available to all employees' performance.
OLP12	My organisation measures the results of the time and resources spent in training
OLP13	My organisation recognizes people for taking initiative.
OLP14	My organisation gives people control over the resources they need to accomplish their work.
OLP15	My organisation supports employees who take calculated risks.
OLP16	My organisation encourages people to think from a global perspective.
OLP17	My organisation works together with the outside community to meet mutual needs.
OLP18	My organisation encourages people to get answers from across the organisation when solving a problem.
OLP19	In my organisation, leaders will mentor and coach those they lead.

Table 3.3: Items for Organisational Learning Practices

OLP20	In my organisation, leaders continually look for an opportunity to
	learn.
OLP21	In my organisation, leaders ensure that the organisation's actions are
	consistent with their values.
OLP22*	Overall, I find that my organisation continuously manages their learning and development practices

*Added as global OLP item for collinearity diagnostic.

Note. The measurement scales were adapted from Yang et al. (2004).

3.5.3 Perceived Internal Employability and Perceived External Employability

This study adapted the 11-item Self-Perceived Employability Scale (SPES) constructed by Rothwell and Arnold (2007) to measure perceived employability within and outside a person's current organisation. An original 16-item scale was assigned to four quadrants: (a) self-evaluation in the current organisation (items 1 to 4), (b) perceived value of occupation in the current organisation (items 9 and 10), (c) self-evaluation outside current organisation (items 5 to 8), and (d) perceived value of occupation outside current organisation (items 11 to 16). As the main interest of the study was to assess employability from an internal and external perspective, the 16 items were divided into six items to measure internal employability and ten items to measure external employability. A principal component analysis was further conducted to validate the distinctions between selfperceived employability, subjective career success, and professional commitment. Subsequently, Rothwell and Arnold (2007) found that five items (1, 7, 10, 12 and 16) out of the 16 items overlap with career success; hence, they were removed from the scale. Consistent with the present study, the 11 items of the SPES were used to measure perceived internal employability and perceived external employability as they provide solid justification that self-perceived employability is a separate construct and an antecedent to career success.

Instead of treating perceived employability as a unitary construct, the researcher split the instrument into two separate constructs. Four items were used to assess perceived internal employability. A sample question for perceived internal employability is "Even if there was a downsizing in this organisation, I am confident that I would be retained". Seven items were used to assess perceived external employability, a sample item being "I could easily get a similar job to mine in almost any organisation". All items were rated on a five-point Likert scale ranging from '1 = strongly disagree' to '5 = strongly agree'. Additionally, perceived internal employability and perceived external employability were measured in the reflective mode as presented in Table 3.4 and Table 3.5.

Code	Measure – Reflective (Five-point Likert Scale: 1-strongly disagree to 5-strongly agree)
PIE1	Even if there was downsizing in this organisation, I am confident that I would be retained.
PIE2	My personal networks in this organisation help me in my career.
PIE3	I am aware of the opportunities arising in this organisation even if they are different from what I do now.
PIE4	The skills I have gained in my present job are transferable to other occupations outside this organisation.

 Table 3.4: Items for Perceived Internal Employability

Note. The measurement scales were adapted from Rothwell & Arnold (2007).

(<i>Five-point Likert Scale: 1-strongly disagree to 5-strongly agree</i>) I could easily retrain to make myself more employable elsewhere.
I could easily retrain to make myself more employable elsewhere.
I could easily retrain to make myself more employable elsewhere.
I have a good knowledge of opportunities for me outside of this organisation even if they are quite different from what I do now.
Among the people who do the same job as me, I am well respected in this organisation.
If I needed to, I could easily get another job like mine in a similar organisation.
I could easily get a similar job to mine in almost any organisation.
Anyone with my level of skills and knowledge, and similar job and organisational experience, will be highly sought after by employers.
I could get any job, anywhere, so long as my skills and experience were reasonably relevant.

Table 3.5: Items for Perceived External Employability

Note. The measurement scales were adapted from Rothwell & Arnold (2007).

3.5.4 Career Success

In this study, academics' career success was operationalised based on the internal, subjective interpretation of career success in juxtaposition with external, objective components. Earlier research works have reported some predominant indicators of success in academia, such as research productivity, career satisfaction, and teaching and research confidence, which most academics and researchers agree upon (Baruch & Hall, 2004; Stupinsky et al., 2015; Sutherland et al., 2013).

For the purpose of this study, the conceptualisation of academics' career success, for the most part, was captured from the key academia success themes suggested by Sutherland (2015) (as shown in Table 2.3). Moreover, a review of past studies on the measures of success in academia (Abu Said et al., 2015; Baruch, 2013; Derosier et al., 2013; Riordan & Louw-Potgieter, 2011; Shockley et al., 2016) further reinforced and complemented these key academia success themes. The researcher, therefore, synthesised career success measures with a mix of objective criteria (i.e., research productivity, performance, and salary) and subjective criteria (i.e., life satisfaction, contribution to society, freedom, and growth and development).

In total, nine items adapted and modified from past studies were used to measure academics' career success. Three objective success criteria reflected research productivity, performance, and salary, for example, "I am satisfied with the number of peer-reviewed journals or indexed journals published yearly". Six subjective success criteria evaluated life satisfaction, contribution, freedom, and job satisfaction. These items were rephrased, for example, "I am satisfied with the success I have achieved in my career". Respondents were asked to reflect on the extent to which they felt they had achieved success in these criteria in their academic career using a five-point Likert scale with response options ranging from '1 = strongly disagree' to '5 = strongly agree'. The construction of academics' career success was measured as a reflective construct, as indicated in Table 3.6.

Code	Measure – Reflective
	(Five-point Likert Scale: 1-strongly disagree to 5-strongly agree)
CS1	I am satisfied with the number of peer-reviewed journals or indexed journals published yearly.
CS2	I have been recognised as a good performer in the organisation that I work for.
CS3	I believe the work I have done has contributed to society.
CS4	I am earning as much as I think my work is worth.
CS5	I have continuously improved by developing my skillset in my work.
CS6	I am satisfied with the progress I have made toward meeting my goals for advancement.
CS7	I am satisfied with the success I have achieved in my career.
CS8	I have been able to pursue work that meets my personal needs and preferences.
CS9	I am enthusiastic about my career.

Table 3.6: Items for Career Success

3.6 Questionnaire Layout and Instruments

This study used the survey method with a self-administrated questionnaire as the instrument to collect respondents' feedback on the research topic. Five population-related questions were asked to examine the demographic make-up of the respondents. Five latent variables were proposed in the research model (e.g., protean career attitude, organisational learning practices, perceived internal employability, perceived external employability, and academics' career success). Most of the indicators capturing these constructs were adapted from past literature. The summary of all the instruments in the questionnaire is presented in Table 3.7.

A sample of the questionnaire is attached in Appendix 7.

Variables / Sources	Dimensions	Measures by	Mode of Measurement
Screening Question		1 item	
Demographics	Gender	1 item	Descriptive
	Age	1 item	
	Education	1 item	
	Work tenure	1 item	
	Job position	1 item	
Protean Career	Self-directed attitude	8 items	Reflective
Attitude (Adapted from PCAS by Briscoe & Hall, 2005)	Value-driven attitude	6 items	
Organisational	1) Continuous learning	3 items	Reflective-
Learning Practices	2) Dialogue & inquiry	3 items	Formative
(Adapted from DLOQ by	3) Team learning	3 items	Higher-order
Yang et al., 2004)	4) Embedded system	3 items	Construct
	5) Empowerment	3 items	
	6) System connection	3 items	
	7) Provide leadership	3 items	
	8) Single global item*	1 item	
Perceived Internal Employability (Adapted from SPES by Rothwell & Arnold, 2007)	Measures for academics' perception of internal employability.	4 items	Reflective
Perceived External Employability (Adapted from SPES by Rothwell & Arnold, 2007)	Measures for academics' perception of external employability.	7 items	Reflective

 Table 3.7: Questionnaire Layout and Instruments

Career Success	Objective success	3 items	Reflective
(Adapted from Abu Said	criteria		
et al., 2015; Baruch,	Subjective success	6 items	
2013; Derosier et al.,	criteria		
2013; Riordan & Louw-			
Potgieter, 2011;			
Sutherland, 2015)			

3.7 Data Collection Methods

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Data for this study was collected via structured self-administered questionnaires that were distributed using the Drop-off and Pick-up (DOPU) method. In the DOPU method, questionnaires are hand-delivered to respondents and picked-up in-person at a designated later time. Empirical evidence proves that this method results in higher response rates compared to other impersonal survey methods (Clark & Finley, 2007; Dillman, Smyth, & Christian, 2009; Steele et al., 2001). Moreover, some researchers have criticised that non-personal surveys (e.g., direct mail and e-mail) face the common problem of non-response bias due to low response rates and non-coverage error associated with failure to include or identify eligible respondents in the sampling frame (Connelly, Brown, & Decker, 2003; Dillman et al., 2009). Thus, in this study, the researcher decided to use DOPU technique to optimise contact with the respondents and reduce the non-response rate. In addition, the issue of physical distance was not a main concern for the researcher since the majority of HEIs in the sampling frame are situated in the Klang Valley (Kuala Lumpur, Selangor and Putrajaya), which made it relatively convenient for the researcher to travel and distribute the questionnaires by hand.

Research has shown that in the context of social survey research, respondents tend to complete questionnaires in return for current and future rewards, such as financial incentives as well as the satisfaction and ability to voice their opinion, particularly if the research is relevant to the respondents (Hsieh & Kocielnik, 2016). Since the study was about academics' career success, which is highly relevant and beneficial to the respondents (e.g., academic staff), it was assumed that the respondents would be willing to participate in the survey. Research also implies that respondents are more willing to cooperate if a survey is sponsored or supported by well-known organisations, such as universities or government agencies, which may also influence the response rate (Zikmund et al., 2019). Therefore, a cover letter approved by the researcher's university (UTAR) was attached with each questionnaire to clarify the general purpose of the survey and provide general instructions on its completion. To access the respondents, questionnaires were personally delivered via faculty administrators, lecturers, and heads of school at the chosen institutions. The researcher returned later to pick-up the questionnaire in-person at a designated time. Respondents were assured that all information collected would be kept confidential and no feedback on their answers would be provided to their institutions.

The DOPU method allowed the researcher to make face-to-face contact with the respondents or the contact person who assisted in distributing the questionnaire. Thus, the researcher was able to explain, in person, the purpose of the study and the importance of the respondents' participation in the research. The researcher also picked up the questionnaires at a designated time, which effectively reduced the difficulty of respondents (or the contact persons) in returning the questionnaires. Moreover, telephone and e-mail follow-up reminders were used to remind the respondents and the faculty administrators (or the distributors) on the date for collection or pick-up. As stated by Steele et al. (2001), follow-up after questionnaire drop-off is an important survey action to increase the response rate.

3.8 Data Analysis Methods

Descriptive and inferential statistics were employed in this study. Descriptive statistics were used to organise and explain the collected data sets in the form of tables, graphs, and charts. Values of mean, minimum, maximum, and standard deviations were computed under the descriptive statistical approach to profile the respondents of the study. Next, inferential statistics were used to make decisions, inferences, predictions, and explanations about the characteristics of the population based on the data obtained.

To test the academics' career model and draw inferences about the hypotheses, PLS-SEM was used to analyse the data, as it is one of the most preferred methods of analysis in research related to theory development and variance explanation (Hair et al., 2017, 2018; Ramayah, Cheah, Chuah, Ting, & Memon, 2018). The relevance and applicability of PLS-SEM in higher education research has increased recently, particularly in predictive and explanatory studies (Ghasemy, Teeroovengadum, Becker, & Ringle, 2020; Hair et al., 2020).

3.8.1 Structural Equation Modelling

The present study sought to explain and justify the strength of relationships among the variables by determining the cumulative effects of the constructs in the research model. The research model comprised direct and indirect (mediating) paths leading to academics' career success, whereby the significance of each path had to be measured and justified. Hence, SEM was considered the most appropriate technique for this study, given that it is a second-generation multivariate statistical approach for testing and analysing causal relationships among constructs, especially those with complex relationships. SEM is known to be a powerful multivariate statistical tool in measuring path significance, since it comprises path analysis, multiple regression, and factor analysis (Ramayah et al., 2018), which can simultaneously estimate the direct and indirect (mediating) effects of multiple variables while accounting for measurement errors in the model (Ringle et al., 2020). As such, SEM allows the researcher to assess and justify measurement properties and structural relationships concurrently.

Covariance-based SEM and Partial Least Squares SEM

There are two statistical approaches within SEM: covariance-based (CB-SEM) and variance-based (PLS-SEM). CB-SEM reproduces the theoretical covariance matrix by applying the maximum likelihood (ML) estimation to minimise the difference between the observed covariance matrix and the theoretical matrix (Hair et al., 2017). CB-SEM is mainly used for theory testing, theory confirmation, and theory comparison without focusing on explained variance. PLS-SEM, on the other hand, focuses on maximising the explained variance between predictor variables and dependent variables through a series of least square estimations. PLS-SEM is primarily used for research that is prediction-oriented, theory-building, or exploratory. Both CB-SEM and PLS-SEM are different in terms of their statistical assumptions. As presented in Table 3.8, the rules-of-thumb suggested by Hair, Ringle, and Sarstedt (2011) guided the selection of PLS-SEM as the statistical analysis approach for the present study.

	Criteria	CB- SEM	PLS- SEM
1	Research goalsa) Predicting the key target construct.b) Exploratory or extension of existing structural theory.c) Theory testing or comparing alternative theories.		$\sqrt{1}$
2	Measurement model specificationa) Formative constructs are part of the structural model.b) Error terms require additional specification.		\checkmark

 Table 3.8: Rules of Thumb for selecting CB-SEM or PLS-SEM

3	Structural modela) Structural model is complex (many constructs/items).b) Structural model is non-recursive.	\checkmark	\checkmark
4	Data characteristics and algorithm		
	a) Data meets the distributional assumptions.		
	b) Data does not meet the distributional assumptions.		\checkmark
	c) Sample size is relatively low.		\checkmark
	d) Large sample size*.		
	e) Data is non-normally distributed.		
	f) Data is normally distributed.		
	*With large data sets, CB-SEM and PLS-SEM results are similar.		
	PLS-SEM results are a good approximation of CB-SEM results.		
5	Model evaluation		
	a) Latent variable scores are required in subsequent analysis.	1	\checkmark
	b) Global goodness-of-fit criterion is required.		I
	c) Test of measurement model invariance is required.		

Source: Hair et al. (2011).

3.8.2 **Justification for Choosing PLS-SEM**

Guided by the above rules of thumb, the researcher decided to use PLS-SEM as the statistical approach to investigate the statistical relationships among the variables in the research model for the following reasons:

1) The present study was prediction-based. Propositions were developed for the researcher to predict the relationships among the variables related to academics' career success. The research model was adapted from the wellknown SCCT-CSM model, with two exogenous constructs (protean career attitude and organisational learning practices) and mediators (perceived internal and external employability) as determinants of career success. The researcher aimed to validate the application of the SCCT-CSM to the 143

academia context and explore the extended model with two added (mediator) constructs. PLS-SEM is considered more appropriate for exploratory research since it is able to estimate the loadings and weights of latent variable scores (LVs) that are important to explain correlations between the latent variables and their observed or manifested variables (Hair et al., 2017).

2) Parallel with the expansion of HRM research towards more multifaceted HRM models, considering contingency and contextual perspectives (Ringle et al., 2020) has become imperative. Consequently, in addition to investigating the simple direct relationships between the independent variables and dependent variable, this study also considered the interactions between the variables using mediation analysis to understand the contingency nature of the model, even discerning between the different strengths of impacts of the two contingency (e.g. mediating) variables. With its superior capacity in handling moderation and mediation analyses, PLS-SEM is more reliable when dealing with complex models (large number of indicators, several layers of constructs, or direct and indirect relationships between constructs). PLS-SEM allows the researcher to hypothesise mediating effects, either in isolation or in a combination of a mediated moderation or moderated mediation model in a single model (Nitzl, Roldan, & Cepada 2016). In fact, PLS-SEM is particularly useful and more superior for mediation and conditional analyses over regression analyses (Sarstedt, Hair, Nitzl, Ringle, & Howard, 2020).

- 3) More recent studies on HRM have adopted formative measures to conceptualise HRM practices or predictors (Ringle et al., 2020). Similarly, in this study, organisational learning practice was operationalised as a formative construct formed by seven dimensions of learning. As suggested by Hair et al. (2019), if the measurement of a construct is specified formatively or if a model has a combination of both reflective and formative measures, PLS-SEM is preferable over CB-SEM. CB-SEM imposes specific criteria for model parameters to execute formative measures, which often contradict the theoretical definition of the construct, whereas PLS-SEM offers a higher degree of flexibility in terms of model specification (Hair, Risher, Sarstedt, & Ringle, 2019). Furthermore, in a model with higher-order constructs, such as organisational learning practices in this study, PLS-SEM is preferable in estimating the parameters of hierarchical component models. PLS-SEM allows for simultaneous modelling of constructs at different layers of abstractions and permits both regression and correlation analysis to validate the measurement model more efficiently.
- 4) Researchers are required to fulfil a set of restrictive assumptions before data can be analysed using CB-SEM software. Assumptions of multivariate normality, larger sample size, and independent observations need to be fulfilled by the data to avoid abnormal results that are highly imprecise in CB-SEM (Hair et al., 2018). On the other hand, PLS-SEM offers more flexibility and advantages over CB-SEM in social science research, which

mostly relies on non-normal data. Indeed, data normality is not a required criterion in PLS-SEM analysis. As suggested by Ramayah et al. (2018), even with the absence of CB-SEM's assumptions, PLS-SEM is still a rigorous tool that produces reliable results; thus, PLS-SEM is considered a good approximation of CB-SEM results. Furthermore, PLS-SEM works well with small sample sizes and can easily handle reflective and formative measurement models with no identification problems. PLS-SEM was found to have greater statistical power with high efficiency in parameter estimation, making it more likely to predict and justify specific relationships among constructs (Hair et al., 2017, 2019). For these reasons, PLS-SEM was chosen as the primary approach of data analysis in this study.

3.9 Common Steps in PLS-SEM Analysis

The researcher used the SmartPLS 3.0 software to execute all the PLS-SEM analyses in this study. Model estimation was performed to validate the measurement model and estimate the structural model. The measurement model (also called outer model) specifies the relationship between each 'unobserved' construct or latent variable and its indicators or 'manifest variables' (Henseler, Hubona, & Ray, 2017). Conversely, the structural model (also called inner model) is used to define and predict the relationships (e.g., path coefficients) among the latent variables. A structural model specifies the direct and indirect relationships between exogenous variables and endogenous variables through 'path analysis'. As suggested by past researchers (Hair et al., 2019; Ramayah et al., 2018; Sarstedt, Hair, Cheah, & Becker, 2019), the validation for a research model must be conducted separately for measurement and structural models. It is important to ensure that the measurement model is valid and reliable before attempting to assess the goodness of the structural model. Notably, there are different statistical assessments applied to assess reflective and formative measurement models. The assessment criteria for reflective and formative models as well as the structural model are discussed in the following sections.

3.9.1. Assessment of Measurement Model

According to Hair et al. (2017, 2018, 2019), latent variables can be modelled using reflective or formative indicators. A reflective model has measures (e.g., indicators) that represent the effects (or manifestations) of an underlying construct. For a reflective construct, the arrow direction points from the construct to its reflective indicators. Meanwhile, the formative model has indicators that cause the construct. For a formative construct, the arrow direction points from the indicators to the construct.

In this study, the measurement model included four reflective constructs and one formative (second order) construct. The causality flows of each construct were based on the knowledge gained during the literature review stage as discussed in Chapter Two. Accordingly, the assessment criteria for the reflective and formative measurement models in this study referred to the guidelines suggested by past researchers (Hair et al., 2017, 2019; Ramayah et al., 2018). Moreover, the researcher also performed an assessment of higher-order constructs in the measurement model for organisational learning practices, which is formed by seven dimensions (lower-order constructs) divided into 21 indicators.

Assessing the Reflective Measurement Model

Evaluation of the reflective measurement model consists of assessing the goodness of the measurement model by testing the model's reliability and validity. Reliability refers to the level of confidence that the proposed measurement will produce consistent results throughout replicated measurements. To assess the reliability of the reflective model, the researcher tested internal consistency and indicator reliability. In addition, convergent validity and discriminant validity were tested to assess the validity of the model to confirm that the items measure the given construct without bias and distortion.

 Internal Consistency: Cronbach's alpha (Cronbach, 1971) is a traditional criterion used to assess internal consistency. However, in PLS-SEM, internal consistency is measured using composite reliability. While both Cronbach's alpha and composite reliability measure internal consistency, the latter considers that indicators may have different loadings, whereas Cronbach's alpha tends to underestimate internal consistency reliability by assuming that all indicators are equally weighted and loaded. Composite reliability values vary between zero and one, where higher values show higher levels of reliability. Hair et al. (2018) stated that values from 0.60 to 0.70 are acceptable in exploratory studies, but in more advanced stages of research, values between 0.70 and 0.90 are considered satisfactory.

- 2) Indicator Reliability: Indicator reliability reflects the extent to which an indicator or a set of indicators is consistent with what it intends to measure (Hair et al., 2017). The indicators' loading on their respective latent construct are assessed to testify that the variance explained by each indicator for its construct is greater than the variance explained by other indicators associated with other construct(s). In other words, the reliability of a construct is independent of and calculated separately from other constructs. To confirm an indicator's loading as reliable, loadings must exceed the threshold value of 0.7 (Hair et al., 2018; Henseler et al., 2017), meaning that the latent variable's indicators are able to explain at least 50% of its variance, thus justifying the indicators' reliability.
- 3) **Convergent Validity:** Convergent validity is the extent to which a construct converges in explaining the variance of its indicators. The indicators used to measure a specific construct should share a high proportion of variance in comparison with other constructs. Convergent validity is measured by the Average Variance Extracted (AVE) value. AVE

is the mean value of the squared loadings of all indicators related to a particular construct. Indeed, AVE is equal to the commonality of a construct. By applying the same logic as was used with the indicator loadings, an AVE value of 0.50 and higher shows that, on average, the construct explains more than 50% of the variance of its indicators (Fornell & Larcker, 1981). If AVE is less than 0.5, the convergent validity of the construct is questionable.

4) Discriminant Validity: Discriminant validity refers to the level of correlation between the indicators of one construct with indicators of other unrelated constructs. Discriminant validity testifies that the measured items do not unintentionally measure other constructs that are 'conceptually different'. In other words, discriminant validity indicates that a construct is distinctive and captures phenomena not represented by other constructs in the model (Franke & Sarstedt, 2019). There are three common methods for testing discriminant validity in PLS-SEM: cross-loadings (Chin, 1998), the Forner-Larcker (1981) criterion, and the Heterotrait-Monotrait (HTMT) criterion recommended by Henseler, Ringle, and Sarstedt (2015). Despite reviews of PLS suggesting that the Fornell and Larcker criterion and crossloadings are the dominant approaches for evaluating discriminant validity, recent research casts serious doubts on the efficacy of these criteria (Henseler et al., 2015). Considering recent developments in the application of PLS-SEM, as suggested in latest research (Franke & Sarstedt, 2019; Hair et al., 2020), only the most rigorous HTMT criterion was used to accurately assess the discriminant validity between the constructs in this study.

Henseler et al. (2015) suggested the HTMT as a replacement for Fornell and Larcker's criterion, the robustness of which has been confirmed in a series of simulation studies (Franke & Sarstedt, 2019; Radomir & Moisescu, 2020). HTMT value can be calculated by assessing the mean value of all indicators' correlations across the constructs (i.e., the heterotraitheteromethod correlations) against the (geometric) mean value of the average correlations of the indicators assigned to measure the same construct (i.e., monotrait-heteromethod correlation). Hence, a high HTMT value suggests the existence of discriminant validity problems. Henseler et al. (2015) suggest a threshold value of 0.85 to be considered as meeting the criteria of discriminant validity. However, if the constructs are conceptually similar, a less conservative threshold value of 0.90 can be used. Furthermore, bootstrapping was used to test if the bootstrap confidence interval value was significantly different from 1.00, to further support the presence of discriminant validity (Hair et al., 2019).

Table 3.9 summarises the assessment criteria for a reflective measurement model.

Assessment Type	Criterion	Guidelines	
Internal Consistency	Composite Reliability	 Minimum 0.70 (or 0.60 for exploratory study) Recommended 0.80 to 0.90 Maximum of 0.95 to avoid indicator redundancy 	
Indicator Reliability	Reflective Indicator Loadings	 eflective Preferably higher than 0.708. Item's loading of 0.60 to 0.70 and significant at the 0.05 level is acceptable 	
Convergent Validity	Average Variance Extracted	• Average Variance Extracted should be higher than 0.50.	
Discriminant Cross Loadings Validity		• Indicator's loading is higher for its assigned construct.	
	Fornell & Larcker	• AVE of each construct should be higher than the squared correlations with all other constructs – each construct shares more variance with its own block of indicators than with other constructs.	
	Heterotrait Monotrait ratio (HTMT)	 HTMT < 0.90 for conceptually similar constructs. HTMT < 0.85 for conceptually different constructs. 	

Table 3.9: Reflective Measurement Model's Assessment Guidelines

Source: Ramayah et al. (2018).

Assessing the Formative Measurement Model

In modelling the formative construct, the researchers had to first address content validity issues. The comprehensive set of indicators that form the formative construct must be verified in terms of their weights and contribution of each indicator to the formation of the construct. Rather than assessing the correlation of the indicators and the construct as in the reflective model, the assessment of the formative measurement model consists of assessing the (1) convergent validity of the formative construct, (2) indicator collinearity, and (3) significance and relevance of the formative indicators (Hair et al., 2018).

- 1) Convergent Validity: In the formative model, convergent validity assesses the correlation of the formative construct with alternative measures of the same concept. Redundancy analysis (Chin, 1998) was used to assess the convergent validity of the formative construct. To execute the redundancy analysis, the researcher included a global single item in the questionnaire measuring the formative construct (e.g., OLPG) to capture the essence of the construct that the formative indicators are assigned to measure (Cheah, Sarstedt, Ringle, Ramayah, & Ting, 2018). Then, the formative construct was used as an exogenous variable predicting the same construct operationalised as a global single item. The formative construct must be highly correlated with the reflective measure (using a global single item) of the same construct, where the path coefficient linking both constructs should be 0.70 or higher (Hair et al., 2017, 2018, 2019).
- 2) **Collinearity:** Correlations between formative indicators are not expected in a formative measurement model. In fact, high correlations between formative indicators are treated as collinearity issues and might affect the estimation of weights and the statistical significance of indicators. The

variance inflation factor (VIF) is used to investigate the collinearity of the formative construct, where a higher VIF indicates greater collinearity. Two widely accepted rule of thumb are: VIF values of 5.0 or higher (Hair et al., 2011) or higher than 3.3 (Diamantopoulos & Siguaw, 2006) indicate potential collinearity. Ideally, the VIF should be below 3.0.

3) Indicators' Significance and Relevance: As a formative construct is formed by its assigned indicators, it is important for the researcher to assess the indicators' outer weights to justify the relative contribution of each formative indicator to the construct. Since PLS-SEM is a non-parametric statistical method, the researcher used bootstrapping to determine the statistical significance (t-values) of each formative indicator's weight (Chin, 1998). Generally, if an indicator's weight is not significant, the indicator should be removed from the model. However, non-significant outer weights should not be eliminated automatically. Rather, the researcher must consider the indicator's absolute contribution to its construct by assessing the indicator's outer loading. Indicators with non-significant outer weights can be removed if the outer loading is also not significant (Hair et al., 2018). Nevertheless, the indicator should not be eliminated simply based on statistical outcomes but should also refer to the theoretical justification of the construct. In addition, bias-corrected and accelerated (BCa) bootstrap confidence intervals is used to report on the stability of a coefficient estimate (Hair et al., 2017, 2019).

Table 3.10 presents the assessment guidelines for the formative measurement model.

Assessment Type	Criterion	Guidelines
Convergent Validity	Redundancy Analysis	 Path coefficient of 0.70 and above exhibit satisfactory level (Hair et al., 2017) Path coefficient of 0.8 and above exhibit high satisfactory level (Chin, 1998).
Collinearity	VIF	 VIF of 5.0 or higher, indicates potential collinearity problem (Hair et al., 2017). VIF of 3.3 or higher, indicates potential collinearity problem (Diamantopoulos, & Siguaw, 2006)
Significance & Relevance of Outer Weights	Bootstrapping Bootstrap Confidence Interval	 Bootstrapping result indicates that indicator outer weight is significant (t-values & p-values) BCa bootstrap confidence interval result indicates a significant effect if the confidence interval does not include the value of zero. If non-significant weight but outer loading is significant (or higher than 0.50), the indicator can be retained. If the non-significant weight and non-significant outer loading (or lower than 0.50), the indicator can be removed.

Table 3.10: Formative Measurement Model's Assessment Guidelines

Source: Ramayah et al. (2018).

3.9.2 Assessment of Hierarchical Components Model

Since one of the latent variables (i.e., organisational learning practices) in

the model was formed by multidimensional constructs, it is more likely that some

of its indicators had non-significant outer weights in the formative measurement model. To deal with this issue, the assessment of the hierarchical component model (HCM) was conducted on this construct. HCM in PLS-SEM allows the researcher to model an abstract construct (i.e., higher-order construct) with its subdimensions (i.e., lower-order constructs) by extending the conceptualisation of the standard construct from a single layer to two or more layers of abstraction to achieve model parsimony and reduce model complexity by minimising the number of path model relationships (Becker et al., 2012; Sarstedt et al., 2019). HCM offers a means for the researcher to reduce collinearity among formative measurement items by rearranging the items and/or constructs across different concrete (sub)dimensions under an overall abstraction as a representation of the dimensions (Hair et al., 2018).

A higher-order construct is a general variable that is either represented (reflective) or constituted (formative) by its lower-order constructs. Typically, there are four types of HCM: Type I reflective-reflective HCM, Type II reflective-formative HCM, Type III formative-reflective HCM, and Type IV formative-formative HCM. Adopting the conceptualisation for DLOQ (Yang et al., 2004) as shown in Figure 3.2, organisational learning practices (higher-order construct) consists of seven distinct dimensions (lower-order constructs), each represented by three manifest indicators. The construct was thus taken as a Type II reflective-formative higher-order construct.



Figure 3.2: Conceptualisation of the Dimensions of Learning Organisation *Source:* Adapted from Yang et al. (2004)

After reporting the type of hierarchical latent variable as reflectiveformative, the researcher decided to use the repeated indicator approach to estimate the HCM. In general, there are two main approaches to handle measurement issues in HCM: (1) the repeated indicator approach and (2) the two-stage approach (Becker et al., 2012; Sarstedt et al., 2019). Till now, there is only limited evidence to support the appropriateness of these approaches for specific types of HCM in PLS-SEM. However, Becker et al.'s (2012) simulation results on the relative advantages of both approaches in assessing reflective-formative HCM showed that the repeated indicators approach is generally preferable to estimate parameters in reflective-formative type HCM. Moreover, this approach is more advisable for lower-order constructs with an equal number of indicators, such as organisational learning practices in the present model, which is formed by seven lower-order constructs with three reflective indicators each. As such, the repeated indicator approach was able to estimate all constructs simultaneously rather than estimating higher-order constructs and lower-order constructs separately, thereby avoiding interpretational confounding.

Extended from the repeated indicator approach, the researcher used Mode B estimation that is more appropriate for formative second-order constructs instead of Mode A estimation that is associated with reflective second-order constructs. As suggested by Becker et al. (2012), Mode B estimation produces the smallest parameter estimation bias in the estimation of reflective-formative type HCM. Once the specification and estimation of higher-order constructs in PLS-SEM was decided, the researcher estimated the appropriateness of the lower-order constructs and the higher-order construct. Standard quality criteria for measuring reflective models such as indicator loading, AVE, composite reliability, and discriminant validity were applied to assess the lower-order reflective constructs. In the assessment of the higher-order construct, estimations on the relationships between lower-order constructs and the higher-order construct were considered, instead of the relationship between the higher-order construct and its indicators.

The higher-order organisational learning practices construct in this study is formed by seven lower-order constructs; thus, the standard formative model quality criteria (i.e., convergent validity, collinearity issues, and the significance and relevance of outer weights) were used to assess the relationship between lowerorder and higher-order formative constructs. The seven lower-order constructs acted as indicators of the higher-order organisational learning practices construct. The weights of the lower-order constructs on the higher-order constructs and their significance were further estimated to explain the contribution of the former in forming the latter (Chin, 1998; Hair et al., 2017, 2018).

Table 3.11 summarises the checklists for using reflective-formative HCM in PLS-SEM.

Steps	Guidelines
Model Specification	 Specify the types of HCM: Type I Reflective-Reflective Type II Reflective-Formative Type III Formative-Reflective Type IV Formative-Formative Specify the approach used for the estimation of HCM: Repeat Indicators Approach Two-stage Approach
Estimation	 Use Mode A or Mode B estimation: Use Mode A for estimating reflective-reflective and formative-reflective type HCM. Use Mode B for estimating reflective-formative and formative-formative type HCM. Use the path weighting scheme.
Measurement Model Evaluation (Reflective- Formative HCM)	 Apply reflective model's quality criteria in assessing lower-order (reflective) construct i.e. indicator loading, AVE, composite reliability and discriminant validity. Estimate the relationships between lower-order and higher-order constructs as the (formative) measurement model of higher-order construct. For reflective-formative type HCM: Interpret the relationship as weights and thus assess convergent validity, collinearity and the significance and relevance of outer weights.

Table 3.11: Checklist for Using HCM in Measurement Model

Note: The checklists for using HCM were adapted from Sarstedt et al. (2019).

3.9.3. Assessment of Structural Model

Once the measurement model was validated and the constructs were confirmed to be reliable and valid, the assessment of the structural model was performed to examine the model's predictive capabilities and justify the relationships between the variables. According to Hair et al. (2018), the structural model depicts the causal relationships among all constructs in the model. Thus, assessing the structural model enables the researcher to provide empirical support for the hypothesised relationships among the constructs in the research model. Standard assessment criteria for structural model evaluation include the significance of path coefficients, the explained variance (R^2) of all endogenous constructs, effect size (f^2), and predictive relevance (Q^2).

Assessing the Structural Model's Collinearity Issues

Since the structural model coefficients are derived from estimating a series of regressions on the relationships among the model's constructs, it is crucial to address collinearity issues (i.e., predictor-criterion collinearity) to avoid misleading or biased regression results. The common rules of thumb for VIF values of below 5.0 (Hair et al., 2011, 2017) or below 3.3 (Diamantopoulos & Siguaw, 2006) were applied to trace collinearity. Ideally, VIF values should be below 3.0.

Assessing the Significance and Relevance of Path Coefficients

Since PLS-SEM is a non-parametric analytical tool, the bootstrapping procedure was used to estimate the path significance of the structural model to avoid the inflation and deflation of standard errors due to non-normality issues (Ramayah et al., 2018). The estimation of path coefficients provides evidence for the inner model's quality, and specifically, allows the researcher to predict the hypothesised relationships among all the constructs. The standardised values of path coefficients are between -1 to +1, whereby an estimated value close to +1 represents a strong positive relationship and vice versa for negative values. Furthermore, the path coefficients should be tested at the 0.05 significant level at least (Hair et al., 2017). The critical t-values (in bootstrapping) of 1% (α =0.01), 5% (α =0.05), and 10% (α =0.10) are equal to 2.58, 1.96, and 1.645 respectively in a two-tailed test. Meanwhile, the critical t-values of 1% (α =0.01), 5% (α =0.05), and 10% (α =0.10) are equal to 2.33, 1.645, and 1.28 respectively in a one-tailed test

Assessing the Explained Variance (R^2)

As a predictive statistical approach, PLS-SEM aims to maximise the explained variance (R^2) of the endogenous construct. R^2 measures the combined effects of the exogenous constructs on the endogenous construct(s), which indicates the proportion of variance in the endogenous construct(s) explained by the exogenous constructs linked to it. In order words, R^2 reflects the predictive power of a model (Chin, 1998). The R^2 value ranges from 0 to 1, where a higher value indicates a higher level of predictive accuracy. Chin (1998) suggested that an R^2 value of 0.67 is substantial, 0.33 is moderate, and 0.19 is weak in predictive power. Alternatively, Hair et al. (2017, 2019) stated that an R^2 value of 0.75 is substantial, 0.50 is moderate, and 0.25 is weak in predictive accuracy. Nevertheless, an acceptable R^2 value should be interpreted in relation to the context of the study and should be high enough to achieve a minimum level of predictive power for a model (Urbach & Ahlemann, 2010).

Assessing the Effect Size (f²)

Besides examining the R^2 value, the researcher also evaluated the effect size of each predictor construct using Cohen's effect size, f^2 (Cohen, 1988). The f^2 is used to assess the relative impact of an exogenous construct on an endogenous construct. Specifically, f^2 assesses the strength of an exogenous construct in influencing the R^2 of an endogenous construct by removing a predictor construct from the tested model and estimating the consequent change in the dependent construct's R^2 value. In general, f^2 values of 0.02, 0.15 and 0.35 are described as small, medium, and large effects, respectively (Cohen, 1988). Indeed, a large effect size (f^2) indicates that the difference between R^2 included and R^2 excluded is large, which justifies that the predictor (independent) construct has a substantial influence on the dependent (endogenous) construct.

Assessing the Predictive Relevance (Q^2)

The researcher further evaluated the model's predictive power by assessing the predictive relevance (Q^2) value (Geisser, 1975; Stone, 1974). The Q^2 is measured by the blindfolding procedure that removes and predicts single data points for a block of indicators specifically in the reflective measurement model. Q^2 is estimated by comparing original values with the predicted values. The smaller the difference between the original value and the predicted value, the greater the Q^2 value and, therefore, the higher the path model's predictive accuracy (Chin, 1998).
As a general guideline, Q^2 values should be greater than zero to affirm that the model has predictive accuracy, and a higher Q^2 means a better predictive relevancy (Urbach & Ahlemann, 2010). As a rule of thumb, Q^2 values of 0.02, 0.15 and 0.35 reveal the small, medium, and large predictive relevance of the model (Henseler, Ringle, & Sinkovics, 2009).

Table 3.12 summarises the assessment criteria for the structural model.

Assessment Criterion	Guidelines							
Lateral Collinearity (VIF)	 VIF ≤ 5 (Hair et al., 2011); VIF ≤ 3.3 (Diamantopoulos & Siguaw, 2006). Ideally, the VIF values should be below 3. 							
Path Coefficient	 Path coefficients between the constructs based on t-values in bootstrapping. The t-values of 1% (α=0.01), 5% (α=0.05) and 10% (α=0.10) are 2.58, 1.96, and 1.645 in a two-tailed test. The t-value of 1% (α=0.01), 5% (α=0.05) and 10% (α=0.10) are 2.33, 1.645, and 1.28 in a one-tailed test. 							
Measurement of Explained Variance (<i>R</i> ²)	 Indicates the proportion of variance in the endogenous construct(s) explained by the exogenous constructs linked to it. R² value of 0.67 is substantial, 0.33 is moderate and 0.19 is weak in predictive power (Chin, 1998). R² value of 0.75 is substantial, 0.50 is moderate and 0.25 is weak in predictive accuracy (Hair et al., 2017). 							
Measurement of Effect Size (f ²)	 Estimates the relative impact of an independent construct on an endogenous construct. The <i>f</i>² values of 0.02, 0.15 and 0.35 describe small, medium and large effect sizes respectively (Cohen, 1988). 							

 Table 3.12: Assessment Criteria for Structural Model Evaluation

Measurement of Predictive Relevance (Q ²)	 Estimates the predictive relevance of a block of indicators (using blindfolding procedure) Q² values of 0.02, 0.15 and 0.35 reveal small, medium and large predictive relevance of the model (Henseler et al., 2009).
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Source: Ramayah et al. (2018).

3.9.4. Assessment of Mediation Model

Mediation analysis has become increasingly prominent in social science and business research (Memon et al., 2018). Most scholars today place high emphasis on mediation models, and it is 'almost mandatory' in contemporary research (Bullock et al., 2010). Consistently, in the present study, a multiple mediation model was developed, where two mediator constructs, perceived internal employability and perceived external employability were added and intervened between the independent and dependent variables.

The causal-step approach developed by Baron and Kenny (1986) has been widely used for testing mediation effects in social science research. However, despite its popularity, this causal procedure approach is debated on its limitations in measuring the magnitude of a mediation effect, giving rise to calls for a reconsideration of this method in mediation analysis (Hayes, 2013; Preacher & Hayes, 2008; Zhao, Lynch, & Chen, 2010). Thus, in estimating the mediating effect of perceived internal employability and perceived external employability in this study, the researcher referred to the multiple mediation macro developed by Preacher and Hayes (2008), where the coefficient for direct and indirect paths are computed but the direct effect does not necessarily have to be significant for mediation to exist, since the indirect effect is the emphasis in mediation analysis (Hayes & Scharkow, 2013). As recommended by Preacher and Hayes (2008), a significance test was conducted using the bootstrapping procedure as the PLS-SEM approach does not assume the normality of the data. Furthermore, bias-corrected and accelerated (BCa) bootstrap is strongly recommended by past researchers (Hair et al., 2017; Hayes & Scharkow, 2013; Preacher & Hayes, 2008; Zhao et al., 2010) in estimating mediating effects.

Figure 3.3. illustrates the mediation analysis procedure recommended by Zhao et al. (2010).



Figure 3.3: Mediation Analysis Procedure using PLS-SEM *Source:* Hair et al. (2017).

Step 1: Defining the Significance of the Indirect Effects

In the simplest form of mediation shown in Figure 3.4, the indirect effect is tested by assessing two paths: (1) from the independent variable X to the mediator M (p_1) and (2) from the mediator M to the dependent variable Y (p_2). To justify the existence of a mediation effect, the indirect effect of $p_1 \ge p_2$ must be significant via the bootstrapping test. More specifically, the bias-corrected bootstrap confidence interval (BCa) is used to detect mediation effects as it is a more reliable test, as per Hayes and Scharkow (2013). A statistically significant p-value (<0.05) and t-value (>1.96 for two-tailed), indicate the existence of a mediation effect. Furthermore, a 95% bias-corrected bootstrap confidence interval for the indirect effect that does not straddle zero also supports the presence of mediation.



Figure 3.4: General Mediation Model

Step 2: Determine the Type and Strength of Mediation

The significant indirect effect $p_1 \ge p_2$ in Step 1 indicates the existence of a mediating effect. Past studies have suggested two main types of mediation, i.e., full 167

and partial mediation. Partial mediation can further be divided into competitive and complementary partial mediation. Reporting the type of mediation might extract more information about mediation effects (Hair et al., 2018; Nitzl et al., 2016). However, recent literature advocates that reporting full and partial mediation has little value and should be avoided (Hayes & Rockwood, 2016; Rungtusanatham, Miller, & Boyer, 2014). Notably, the claim of full mediation means the researcher has measured all possible mediators without error, which is practically impossible in social science and business research (Memon et al., 2018; Ramayah et al., 2018). Moreover, Hayes (2013) argued that reporting partial mediation would lead to a mis-specified model. Accordingly, in this study, the researcher concluded that mediation exists when the indirect effect is supported, regardless of the presence of 'full' or 'partial' mediation.

In the case of assessing the strength of the mediation effect, the approach used in this study was calculating the ratio of the indirect-to-total effect. This ratio refers to the variance accounted for (VAF) value, which defines the extent to which the mediation process explains the dependent variable's variance (Nitzl et al., 2016). The formula used to calculate VAF is shown below:

$$VAF = \frac{a \times b}{(a \times b) + c'}.$$

Step 3: Assessing the Multiple Mediation

In this study, the researcher extended the simple mediation model into a more complex multiple mediation model, as shown in Figure 3.5. The model includes multiple linkages between the independent variables, mediators, and dependent variables. The inclusion of multiple mediators (perceived internal employability and perceived external employability) in the research model and the comparison of their specific mediating effects provide a more complete picture of the relationships between the independent variables, mediators, and dependent variables. The quantification of the indirect effects between the two mediators (perceived internal employability and perceived external employability) is also allows the researcher to breach the research gaps and answer the research question as to whether the size of the specific indirect effect through one mediator differs from the other. These findings aim to meet research objectives (5) and (6) stated in the present study.



Figure 3.5: Multiple Mediation Model

The same steps for testing simple mediation were used in analysing the multiple mediation model. The researcher tested the significant indirect effect for each path ($p_1 \ge p_2$ and $p_4 \ge p_3$) and the direct effect between the independent variables and the dependent variable (p_3), as well as the total indirect effect. The bootstrapping procedure in PLS was applied to capture the bootstrap confidence intervals and test the significance of the difference between the two specific mediating effects (perceived internal employability) based on the following equation (Lau & Cheung, 2012).

$$D_M = M_1 - M_2$$

D_M is the difference between the two specific indirect effects while M₁ and M₂ are the specific indirect effect for mediator 1 and mediator 2. In the case of the equation, it would be $D_M = (p_1 \ge p_2) - (p_4 \ge p_5)$. The researcher aims to assess the potential statistical difference between the two mediators and tests whether these two mediating effects are equal or if they amount to zero. A spreadsheet application (refer to Appendix 8) is used calculate the equation to build a confidence interval with the help of the bootstrapping results of the PLS program (Cepeda-Carrion, Nitzl, & Roldan, 2018; Rodríguez-Entrena, Schuberth, & Gelhard, 2016).

3.10 Ethical Considerations

According to Saunders et al. (2012), research ethics refer to the appropriateness of the researcher's behaviour to the rights of those who become the subject of researcher's work or who are affected by this study. The present study used the survey approach to collect data from human subjects, which expectedly raises some important ethical concerns such as physical and psychological harm, privacy, and informed consent (Neuman, 2014). This study involved academic staff from different institutions who may think that their participation in the survey would disclose their overall perception (like or dislike) towards their institution and would thus jeopardise their performance appraisal in their workplace.

The ethical considerations of this research ensured that no risks were posed to the respondents who participated, whether physical, psychological, or legal. To address these issues, explicit statements were stated in the cover letter enclosed with the questionnaire, clarifying that responses to the survey would be entirely confidential and participation was voluntary. Moreover, to avoid perceived deception in the survey, the cover page of the survey questionnaire clearly stated the identity of the researcher, the contact number of the institution (UTAR) that verified the research, and the objectives of the research. Confidentiality was guaranteed under the Personal Data Protection Act (PDPA) 2010, such that respondents' identity was not disclosed, all information collected was kept confidential, and the information was used only for academic purposes. Finally, a formal procedure for the application of the university's ethics clearance was followed before administering the survey (refer to Appendix 9).

3.11 Chapter Summary

This chapter explained the formation of the research methodology of the present study, inclusive of the research philosophy, research approach, research strategy, research choices, and time horizon. Following this, the explanation on the sampling unit, sampling procedure, and data collection method was presented. Also, discussions on the DOPU survey method and the development of the research instruments for all the variables were clarified in this chapter. The researcher used SPSS version 22 to execute the descriptive analysis of respondents' profile, while SmartPLS 3.0 was used to execute all the PLS-SEM analyses in evaluating the research framework and draw inferences about study hypotheses. Details of the measurement model assessment, HCM estimation process, and structural model estimation and validation process were discussed. Furthermore, the mediation model analysis process was also presented in this chapter. The results of the analysis using PLS-SEM, the interpretation of the results, and the revised model are discussed in detail in the next chapter.

CHAPTER 4

RESULTS

4.1 Introduction

The research methodology, including the research design, measurement items, data collection, and data analysis procedures have been discussed in the previous chapter. Statistical analysis of the data collected using the survey was conducted to verify and validate the research model. This chapter presents the empirical findings from the analysis using the statistical approaches discussed in Chapter Three. Specifically, the results of data refinement, descriptive statistics, multivariate analysis, and hypotheses testing are reported in this chapter.

4.2 Data Preparation and Preliminary Analysis

Questionnaires were distributed using the DOPU method to directly access the respondents from various universities and university colleges awarded SETARA's (2017) 4-star rating and above. Data collection took approximately four months, starting from the beginning of February 2019 to the end of May 2019. To acquire the targeted number of responses, the researcher distributed 600 questionnaires, of which 304 (50.6% response rate) were returned. However, after preliminary data screening, 15 cases were excluded from further analysis due to non-compliance to the requirements of the questionnaire. Specifically, nine respondents were non-Malaysian academic staff while six responses were incomplete (only general information was provided without answering the rest of the questions).

Therefore, only 288 questionnaires (48% of the returned responses) were eligible for analysis. Baruch and Holtom (2008) analysed 490 journals published from the year 2000 to 2005 to examine the response rates for surveys in organisational research, finding that the average response rate is 48.3%. Similarly, other researchers agree that a response rate of approximately 30% is acceptable and reasonable for social science study in the Malaysian context (Auzair, 2011; Nordin, Deros, & Wahab, 2010; Takim & Adnan, 2009). Therefore, the response rate of 48% in this research was deemed acceptable.

Upon preliminary scrutiny, all 288 eligible cases were loaded into SPSS version 22 software for preliminary analysis, which involved:

- 1. descriptive analysis of respondents,
- 2. missing data analysis,
- 3. normality test, and
- 4. detection of common method bias.

4.2.1 Descriptive Analysis for Respondents' Profile

The results obtained from the descriptive analysis represent the demographic information of the respondents, namely gender, age, level of education, duration of employment, and position in the institution. This section analysed both frequency and percentage distributions to provide insights into the demographics of the respondents who participated in this survey.

Of the 288 eligible responses, 159 (55.2%) were male and 129 (44.8%) were female. Most of the respondents (49.3%) were aged between 30 and 40 years old, 25.7% were aged from 41 to 50 years old, 13.9% were aged above 51 years old, and 11.1% of the respondents were below 30 years old. The analysis also showed that more than half of the respondents (58.7%) held a Master's degree, 24% held a Doctoral degree, and 17.3% held a Bachelor's degree or equivalent. Besides, 32.6% of the respondents had worked with the institution for three to five years, 30.6% had worked with the institution for six to nine years, 25.7% had been attached to the institution for less than two years, and 11.1% had worked for more than 10 years in the institution. Finally, half of the respondents (50%) held the position of Assistant Lecturer/Lecturer, 35.1% were Senior Lecturers/Assistant Professors, 9.7% were Associate Professors, and only 5.2% held the position of Professor/Distinguished Professor.

Table 4.1 provides a summary of the demographic information of the respondents.

Demographic	Frequency (n=288)	Percentage (%)
Gender:		
Male	159	55.2
Female	129	44.8
Age:		
Less than 30	32	11.1
<i>30 to 40</i>	142	49.3
<i>41 to 50</i>	74	25.7
51 and older	40	13.9
Highest Education Level:		
Bachelor's degree	50	17.3
Master's degree	169	58.7
Doctoral degree	69	24.0
Years of Working with Organisation:		
Fewer than 2 years	74	25.7
3 to 5 years	94	32.6
6 to 9 years	88	30.6
10 years and above	32	11.1
Position Held in Organisation:		
Asst. Lecturer/Lecturer	144	50.0
Senior Lecturer/Asst. Professor	101	35.1
Associate Professor	28	9.7
Professor/Distinguished Professor	15	5.2

 Table 4.1: Respondents' Demographic Profile

4.2.2 Missing Data

As reported earlier, only six cases were discarded due to incomplete responses. The remaining 288 responses were loaded into SPSS version 22 for data screening, and no missing values were found. Thus, all the responses were complete, and no missing data issue was found in this research.

4.2.3 Data Normality Analysis

Checking data normality is a prerequisite for many multivariate analyses, such as regression analysis in SPSS and SEM. Alternatively, when the normality assumption is violated, other non-parametric statistical techniques should be employed. To check the normality of data, the researcher used Kolmogorov-Smirnov and Shapiro-Wilk's test to compare the score in the sample to a normally distributed data set with the same mean and standard deviation (Hair et al., 2010; Mooi & Sarstedt, 2011). The test indicates whether the null hypothesis, "the sample distribution is normal", should be rejected. The results from the Kolmogorov-Smirnov and Shapiro-Wilk tests (refer to Appendix 10) indicate that all indicators had significant values of less than 0.05, meaning that the null hypothesis of "normally distributed data" was rejected, and the data set was not normal. In sum, the data normality distribution assumption was violated, which provided a strong justification for using PLS path modelling in this study (Henseler et al., 2009).

4.2.4 Common Method Bias

Since the researcher dealt with self-reported data on respondents' perceptions and behaviours, collected through a questionnaire, common method bias was considered an unavoidable issue leading to measurement error that may threaten model validity (Kock, 2015; Podsakoff, MacKenzie, & Podsakoff, 2012; Tehseen, Ramayah, & Sajilan, 2017). To control common method bias, several procedural remedies were applied in this study, such as ensuring the anonymity of the respondents, ensuring the clarity of the questions via specific, simple, and concise words, and avoiding double-barrelled questions and complicated sentences (Tehseen et al., 2017).

In addition to procedural remedies, the researcher also employed a statistical remedy, i.e., Harman's single-factor test, to detect the existence of common method bias before data analysis. In this method, all items from independent and dependent constructs were loaded into a factor analysis using principal axis factoring to test whether a single factor or item accounts for the majority of the covariance among the measures. As evident in Appendix 11, the single factor contributed approximately 24% of the variance in data, which is lower than 50% of the covariance among the items (Podsakoff, MacKenzie, Lee, & Podsakoff, 2003). This indicates that common method bias was not a pervasive issue in the present study.

4.3 PLS-SEM Model Assessments

SmartPLS 3.0 software was used to execute all the PLS-SEM model assessments in this study. The model assessments were performed to validate the measurement model and estimate the structural model. The measurement model specifies the relationship between each 'unobserved' construct and its indicators or 'observed' measures. The structural model, subsequently, defines and predicts the (direct and indirect) relationships among the latent variables in the research model. Validation of the measurement model was conducted before the estimation of the structural model. Notably, different statistical assessments were used to assess the measurement models (reflective and formative) and the structural model.

Figure 4.1 illustrates the path coefficient model converted from the research model and constructed in the SmartPLS software. Once the path model was built in SmartPLS, statistical estimation was performed by running the PLS algorithm and drawing the standardised latent variables scores, such that the algorithm was able to estimate all loadings and coefficients in the measurement model and structural model within the range of -1 to +1. Furthermore, all estimations using the bootstrap algorithm were set to 'no sign change, 5000 bootstrap samples' for the number of valid observations (288 cases) in the data set.



Figure 4.1: Path Model in PLS-SEM

4.4 Evaluating the Measurement Model

The proposed measurement model consists of four reflective constructs (i.e., protean career attitude, perceived internal employability, perceived external employability, and career success) and one reflective-formative higher-order construct (organisational learning practices). The assessment criteria with regards to the reflective model and HCM were applied to validate the measurement model. The researcher tested the indicator reliability (loadings), internal consistency reliability, convergent validity, and discriminant validity. In addition, the repeat indicator approach was used to test the reflective-formative higher-order construct.

4.4.1 Assessing the Reflective Measurement Constructs

Evaluation of the reflective measurement model consists of assessing the model's reliability and validity inclusive of analysing (1) internal consistency reliability via Cronbach's alpha and composite reliability, (2) convergent validity via indicator reliability/outer loading and AVE, and (3) discriminant validity via the HTMT criterion.

Internal Consistency Reliability

As a rule of thumb, Cronbach's alpha and composite reliability values must be higher than 0.70 to justify internal consistency reliability. The measurement model for this study had satisfactory internal consistency reliability since both composite reliability and Cronbach's alpha (α) values for all constructs were greater than 0.70. Composite reliability values ranged from 0.843 to 0.929, while Cronbach's alpha values ranged from 0.751 to 0.918.

Indicator Reliability / Outer Loadings

The present model had four reflectively measured constructs (i.e., protean career attitude, perceived internal employability, perceived external employability, and career success). The indicator loading for each construct was examined, whereby standardised loadings should be at least 0.70 or more to justify the indicators' reliability in the measurement model (Hair et al., 2017, 2019). The first attempt for outer loading analysis (refer to Appendix 12) showed that some indicators (e.g., PCA1, PCA2, PCA4, PCA6, PCA8, PCA10, PCA11, PEE2, PEE7 CS1, CS4, CS6 and CS7) had loadings less than 0.70 but more than 0.60. This means the indicators with loadings below 0.70, the researcher deleted the indicator with the lowest loading from each construct to examine the effect of item removal on AVE.

The removal of items PCA10, PEE7 and CS1 from the respective constructs showed that the AVE values for career success (an increase from 0.481 to 0.501), protean career attitude (an increase from 0.497 to 0.503), and perceived external

employability (an increase from 0.526 to 0.554) all increased above the threshold value of 0.50 (refer Table 4.2). Thus, the rest of the indicators with loadings 0.60 and above were retained since they contributed to AVE scores greater than 0.5, and thus were considered to have an acceptable level of reliability (Byrne, 2016).

Convergent Validity

Next, the researcher assessed the convergent validity of the model to determine the extent to which the constructs converge in explaining the variance of their indicators. Convergent validity was assessed by examining the AVE value of each construct. As a rule of thumb, an AVE value of 0.50 or higher shows that, on average, the construct explains more than 50% of the variance of its indicators (Fornell & Larcker, 1981). Conversely, an AVE less than 0.5 means the convergent validity of the construct is questionable. Before the removal of the indicators with outer loadings lower than 0.70, the result showed that AVE values for career success (0.481) and protean career attitude (0.497) were below the threshold value of 0.50. Thus, the researcher decided to delete the indicators with the lowest value (refer to Appendix 12) in each construct, and the results after the removal of indicators PCA10, PEE7 and CS1 demonstrated that the AVE values for all constructs had become higher than 0.50. Thus, all constructs exhibited acceptable convergent validity.

The results for composite reliability, indicator loadings, and AVE of the reflective constructs are shown in Table 4.2.

		Convergent	t Validity Internal Consiste Reliability		Consistency ability
Latent Variables	Items	Outer	AVE	Composite	Cronbach's
		Loadings		Reliability	Alpha
	CS2	0.723			
	CS3	0.729			
Career Success	CS4	0.652	0.501	0.889	0.857
	CS5	0.714			
	CS6	0.677			
	CS7	0.660			
	CS8	0.765			
	CS9	0.733			
	PCA1	0.671			
	PCA11	0.651			
	PCA12	0.709			
	PCA13	0.740			
Protean Career	PCA14	0.766	0.503	0.929	0.918
Attitude	PCA2	0.696			
	PCA3	0.718			
	PCA4	0.686			
	PCA5	0.747			
	PCA6	0.692			
	PCA7	0.721			
	PCA8	0.696			
	PCA9	0.719			
	PEE1	0.798			
Perceived External	PEE2	0.690			
Employability	PEE3	0 700	0 554	0.881	0.838
Employuomity	PEE4	0.794	0.001	0.001	0.020
	PEE5	0.771			
	PEE6	0.703			
	PIE1	0 748			
Perceived Internal	PIE2	0 797	0 573	0.843	0 751
Employability	PIE3	0.725	0.070	0.015	0.751
Employaomity	PIF4	0.755			
	I IL/T	0.155			

 Table 4.2: Summary of Reflective Measurement Model Assessment

Discriminant Validity

Discriminant validity was tested to justify the extent to which the constructs in the measurement model are truly distinct from one another. It was tested using the HTMT criterion as suggested by latest research. The HTMT test calculates the ratio of average correlation across the constructs against the geometric mean of the average correlations of the items measuring the same constructs. A HTMT ratio close to 1.0 (or exceeding 1.0) would be interpreted as discriminant validity violation. Henseler et al. (2015) suggested the threshold value of 0.85 as a starting point to assess whether discriminant validity problems are present. Also, the researcher used bootstrapping to compute the bootstrap confidence intervals to testify if the lower and upper bounds of the 95% (bias-corrected and accelerated) confidence interval included the value 1.0. The results for discriminant validity using the HTMT criterion are presented in Table 4.3.

	CS	РСА	PEE	PIE
CS				
PCA	0.477 (0.383, 0.564)			
PEE	0.812 (0.756, 0.866)	0.598 (0.507, 0.683)		
PIE	0.732 (0.649, 0.805)	0.447 (0.343, 0.548)	0.743 (0.660, 0.817)	

 Table 4.3: HTMT Criterion Results

Criterion: Discriminant validity is established at HTMT0.85.

Note: CS=career success, PCA=protean career attitude, PEE=perceived external employability, PIE=perceived internal employability

Table 4.3 reports that the HTMT values for all pairs of constructs were lower than the threshold value of 0.85 and no confidence interval included the value 1.0. The findings indicate that the constructs are distinctive and capture phenomena not represented by other constructs in the model, which confirmed the discriminant validity of the model.

To sum up, the results for the reflective measurement model all met the evaluation criteria, thereby supporting the measurement model's reliability and validity as well as fitness for estimating the structural model. Following this, the assessment and validation of the higher-order construct is discussed in the next section.

4.4.2 Assessing the Reflective-Formative Higher-Order Construct

As shown in Figure 4.2, organisational learning practices in this model was conceptualised as a reflective-formative higher-order construct, formed by multidimensional lower-order constructs. The researcher used the DLOQ scale suggested by Yang et al. (2004) to operationalise this construct. These DLOQ is formed by seven dimensions with three items reflecting each dimension, amounting to a total of 21 items.



Figure 4.2: Hierarchical Component Model for Organisational Learning Practices (Mode B Estimation)

The repeated indicators approach with Mode B estimation (Becker et al., 2012) was used to assess the higher-order construct of organisational learning practices. Standard assessment criteria for the reflective model were employed to assess the reliability and validity of the lower-order (reflective) constructs. Subsequently, the relationships between the lower-order constructs and the higher-order construct were estimated to validate the higher-order construct.

Assessing the Measurement Model of Lower-order Constructs

The assessment of the lower-order constructs drew on the standard evaluation criteria for reflective measurement models. The results reported in Table 4.4 show that all reflective model evaluation criteria were met and yielded satisfactory levels of reliability and validity. The composite reliability of the seven lower-order constructs (continuous learning, inquiry and dialogue, team learning, embedded system, empowerment, system connection, and strategic leadership) ranged between 0.798 and 0.878, indicating that all these constructs possess a high level of reliability. Moreover, all indicator loadings exceeded the recommended value of 0.708, and the AVE values for these constructs (ranging from 0.569 to 0.706) also achieved the minimum threshold value of 0.50, showing that adequate convergent validity was achieved.

Furthermore, before assessing a higher-order construct's discriminant validity, researchers must ensure that the lower-order constructs meet the discriminant validity criteria relative to one another as well as to the other reflective first-order constructs in the PLS path model (Hair et al., 2020). Hence, the discriminant validity for these lower-order constructs was assessed using the HTMT criterion. The results displayed in Table 4.5 indicate that all the constructs were distinctively different at HTMT_{0.85}. In addition, supported by the bootstrapping results, the bootstrap confidence interval also confirmed that neither

of the confidence interval values included the value 1.0. This further evidenced the discriminant validity of all the lower-order constructs.

To sum up, all the assessment criteria for the reflective lower-order constructs were met and yielded satisfactory levels of reliability and validity.

Lower-order Construct	Item	Loadings	CR	AVE	HTMT Criterion
Continuous Learning (CL)	OL1	0.784	0.865	0.682	Yes
	OL2	0.858			
	OL3	0.834			
Inquiry & Dialogue (ID)	OL4	0.735	0.820	0.604	Yes
	OL5	0.794			
	OL6	0.801			
Team Learning (TL)	OL7	0.820	0.865	0.681	Yes
	OL8	0.824			
	OL9	0.830			
Embedded System (ES)	OL10	0.793	0.854	0.661	Yes
	OL11	0.842			
	OL12	0.803			
Empowerment (EP)	OL13	0.802	0.798	0.569	Yes
	OL14	0.761			
	OL15	0.695			
System Connection (SC)	OL16	0.758	0.818	0.600	Yes
	OL17	0.769			
	OL18	0.795			
Strategic Leadership (SL)	OL19	0.794	0.878	0.706	Yes
	OL20	0.879			
	OL21	0.845			

 Table 4.4: Summary of Lower-Order Measurement Model Assessment

	CL	ES	EP	ID	SL	SC	TL
CL							
ES	0.665						
	(0.554, 0.764						
EP	0.690	0.848					
	(0.576, 0.806)	(0.793, 0.996)					
ID	0.468	0.707	0.648				
	(0.337, 0.597)	(0.598, 0.806)	(0.520, 0.773)				
SL	0.305	0.614	0.621	0.650			
	(0.189, 0.422)	(0.498, 0.716)	(0.497, 0.738)	(0.539, 0.733)			
SC	0.637	0.603	0.781	0.563	0.505		
	(0.531, 0.733)	(0.487, 0.716)	(0.678, 0.891)	(0.435, 0.685)	(0.388, 0.616)		
TL	0.438	0.841	0.756	0.814	0.750	0.622	
	(0.325, 0.547)	(0.764, 0.912)	(0.651, 0.858)	(0.726, 0.898)	(0.663, 0.832)	(0.514, 0.724	

Table 4.5: HTMT Criterion for Lower-order Constructs

Criterion: Discriminant validity is established at HTMT0.85.

Note: CL=continuous learning, ES=embedded system, EP=empowerment, ID=inquiry & dialogue, SL=strategic leadership, SC=system connection, TL=team learning

Assessing the Formative Higher-Order Construct

After the assessment of the reliability and validity of the reflective lowerorder constructs, the researcher proceeded to assess the fit of the higher-order construct. The assessment of the higher-order construct was derived from the threestep procedure outlined by Hair et al. (2011, 2017) as follows:

- 1) Evaluate convergent validity by running redundancy analysis,
- 2) Evaluate collinearity issues among the lower-order constructs, and
- 3) Evaluate the significance and relevance of the relationship between lowerorder constructs and the higher-order construct using the path weighting scheme.

First, the researcher assessed the higher-order construct's convergent validity by running a redundancy analysis, in which the higher-order organisational learning practices construct was related to a global item measurement (i.e., OLPG) that captured the respondents' overall feedback of the institution's organisational learning practices. Based on the results of redundancy analysis shown in Figure 4.3, the path coefficient magnitude between the two constructs (0.727) was greater than 0.70, whereas the R^2 value of 0.529 for the endogenous construct was above the threshold value of 0.50 (Hair et al., 2017). These results supported that the formative higher-order organisational learning practices construct had enough convergent validity.

Second, the researcher estimated the potential collinearity issues among the seven lower-order constructs of organisational learning practices to ensure that they do not highly correlate in the formative measurement model. Collinearity was tested by examining the inner VIF for the formative higher-order construct, which should be less than 5.0 (Hair et al., 2017) or 3.3 (Diamantopoulos & Siguaw, 2006). As seen in Table 4.6, the VIF values of all the predictor constructs were less than 3.3; thus, no collinearity issues were found among the seven lower-order constructs.

Formative Constructs	VIF values
Continuous Learning (CL)	1.588
Embedded System (ES)	2.279
Empowerment (EP)	1.923
Inquiry and Dialogue (ID)	1.678
Strategic Leadership (SL)	1.655
System Connection (SC)	1.570
Team Learning (TL)	2.317

Table 4.6: VIF Values for Higher-Order Construct's Predictors

Third, the researcher assessed the significance and relevance of the relationships between the lower-order constructs and the higher-order construct by running the bootstrapping procedure (at 5000 subsamples). These relationships indicate the higher-order construct's weights but appear as path coefficients in PLS path model (Sarstedt et al., 2019).



Figure 4.3: Redundancy Analysis

Figure 4.4: Significance of Weight for Higher-Order Construct

The results shown in Table 4.7 and Figure 4.4 reveal that all the lower-order constructs were significantly related (t-values >1.96 and p-values <0.05) to the higher-order organisational learning practices construct, providing evidence to retain all the dimensions. Moreover, the bootstrap confidence interval results seen in Table 4.8 offer additional support for the significance of weights, given that the confidence intervals for all formative constructs did not include the value of zero. Thus, all seven lower-order constructs were found to be significant and relevant in forming the higher-order organisational learning practices construct.

	Original Sample (O)	Sample Mean (M)	Standard Deviation (STDEV)	T-Statistics	P Values
CL -> OLP	0.201	0.201	0.006	32.346	0.000
ES -> OLP	0.192	0.192	0.005	35.096	0.000
EP -> OLP	0.180	0.180	0.005	32.840	0.000
ID -> OLP	0.190	0.190	0.006	30,640	0.000
SL -> OLP	0.204	0.204	0.007	29.922	0.000
SC -> OLP	0.190	0.190	0.006	31.646	0.000
TL -> OLP	0.202	0.202	0.006	33.895	0.000

 Table 4.7: Significance of Weights for Higher-Order Construct

 Table 4.8: Confidence Interval Bias for Formative Indicators

	Original Sample (O)	Sample Mean (M)	Bias	5.0%	95.0%
CL -> OLP	0.201	0.201	-0.000	0.192	0.213
ES -> OLP	0.192	0.192	-0.000	0.185	0.203
EP -> OLP	0.180	0.180	-0.000	0.172	0.190
ID -> OLP	0.190	0.190	-0.000	0.181	0.202
SL -> OLP	0.204	0.204	-0.000	0.194	0.216
SC -> OLP	0.190	0.190	-0.000	0.181	0.200
TL -> OLP	0.202	0.202	0.000	0.193	0.212

4.5 Evaluating the Structural Model

After validating the measurement models and confirming the indicators' reliability and validity, the assessment of the structural model was performed to examine the model's predictive capabilities and explain the relationships among all constructs in the model. The structural model evaluation involved examining the significance of path coefficients, estimating the explained variance (R^2) of all endogenous constructs, examining the effect size of each path in the model (f^2), and finally assessing the model's predictive relevance (Q^2).

4.5.1. Assessing the Structural Model's Collinearity Issues

Before the assessment of structural model, it is crucial to address any collinearity issues in the inner structural model (predictor-criterion collinearity) to avoid misleading or biased regression results. The common rules of thumb in assessing potential collinearity are the VIF value of 5.0 or higher (Hair et al., 2017) or a more stringent criterion of 3.3 or higher (Diamantopoulos & Siguaw, 2006). Table 4.9 presents the results of collinearity test for the inner structural model, where the VIF values for all constructs were below 3.3, thereby validating that there were no potential collinearity issues in the model.

	CS	PEE	PIE
OLP	1.556	1.099	1.099
PCA	1.396	1.099	1.099
PEE	1.942	-	-
PIE	1.801	-	-

 Table 4.9: Collinearity Assessment for Inner Structural Model

4.5.2. Assessing the Significance and Relevance of Path Coefficients

The bootstrapping procedure was used to estimate the path coefficients of the structural model and test the hypothesised relationships. The path coefficients were tested at critical t-values (in bootstrapping) for a significance level of 5% (α =0.05) at a probability error of 1.645 in a one-tailed test (Hair et al., 2019; Ramayah et al., 2018).

Table 4.10 reports the path coefficients estimates, t-values, p-values, and confidence intervals for all the direct paths. The relationships were all found to be significant (organisational learning practices \rightarrow career success, $\beta = 0.193$, t>1.645, p<0.05; organisational learning practices \rightarrow perceived external employability, $\beta = 0.379$, t>1.645, p<0.05; organisational learning practices \rightarrow perceived internal employability, $\beta = 0.489$, t>1.645, p<0.05; protean career attitude \rightarrow perceived external employability, $\beta = 0.412$, t>1.645, p<0.05; protean career attitude \rightarrow perceived external employability, $\beta = 0.412$, t>1.645, p<0.05; protean career attitude \rightarrow perceived external employability, $\beta = 0.232$, t>1.645, p<0.05; perceived external employability, $\beta = 0.232$, t>1.645, p<0.05; perceived external employability, $\beta = 0.459$, t>1.645, p<0.05; perceived internal employability, $\beta = 0.459$, t>1.645, p<0.05; perceived internal employability, $\beta = 0.459$, t>1.645, p<0.05; perceived internal employability.

employability \rightarrow career success, $\beta = 0.190$, t>1.645, p<0.05), except for the effect of a protean career attitude on career success ($\beta = 0.057$, t<1.645, p>0.05). The bootstrap confidence intervals for significance testing also showed that zero was not straddled by the confidence intervals' bias corrected results for all direct paths, except by the path of protean career attitude \rightarrow career success, which was not statistically significant.

	Path Coefficients	t-values	p-values	95% Confidence Interval	Significance (p<0.05)
OLP -> CS	0.193	3.362	0.000	[0.072, 0.270]	Yes
OLP -> PEE	0.379	7.705	0.000	[0.269, 0.436]	Yes
OLP -> PIE	0.489	9.515	0.000	[0.369, 0.551]	Yes
PCA -> CS	0.057	1.251	0.106	[-0.019, 0.132]	No
PCA -> PEE	0.412	8.825	0.000	[0.343, 0.494]	Yes
PCA -> PIE	0.232	4.503	0.000	[0.158, 0.324]	Yes
PEE -> CS	0.459	9.027	0.000	[0.381, 0.548]	Yes
PIE -> CS	0.190	3.706	0.000	[0.113, 0.284]	Yes

 Table 4.10: Path Coefficient Results

Looking at the relative importance of the exogenous constructs in predicting the dependent construct (i.e., career success), perceived external employability (0.459) was the most important predictor, followed by organisational learning practices (0.193) and perceived internal employability (0.190). Interestingly, protean career attitude did not significantly influence career success. All findings for the structural model estimations with their path coefficients, t-statistics, and R^2 values are illustrated in Figure 4.5.



Figure 4.5: Structural Model's Path Coefficients, T-statistics, and R²

4.5.3. Assessing the Explained Variance (R^2)

 R^2 measures the combined effect of exogenous constructs on endogenous constructs, which indicates the proportion of variance in the endogenous construct explained by the exogenous constructs linked to it (Hair et al., 2019). The endogenous constructs in this study were perceived external employability, perceived internal employability, and career success, with reported R^2 values of 0.407, 0.361 and 0.563, respectively (see Figure 4.5). This suggests that the 198 exogenous constructs in this model had moderate predictive power (Hair et al., 2019).

4.5.4. Assessing the Effect Size (f^2)

The researcher assessed the effect size of each predictor construct using Cohen's f^2 (Cohen, 1988) to justify the relative impact of an exogenous construct on an endogenous construct. As suggested by Cohen (1988), f^2 values of 0.02, 0.15 and 0.35 describe small, medium, and large effect sizes, respectively.

The results in Table 4.11 indicate that perceived external employability had a medium effect ($f^2 = 0.248$) on the R^2 of career success, whereas other exogenous constructs such as organisational learning practices ($f^2 = 0.055$), protean career attitude ($f^2 = 0.005$), and perceived internal employability ($f^2 = 0.046$) only had small effects in producing the R^2 for career success. This indicates that perceived external employability is a more important predictor that has a higher impact compared to the other exogenous constructs with regard to academic staff's career success. Besides, organisational learning practices ($f^2 = 0.220$; 0.340) had a medium effect in predicting the R^2 for perceived external employability and perceived internal employability. Similarly, protean career attitude had a medium effect ($f^2 =$ 0.261) on perceived external employability but only a small effect ($f^2 = 0.077$) on the R^2 of perceived internal employability.
	CS	f²	PEE	f²	PIE	f²
OLP	0.055	Small	0.220	Medium	0.340	Medium
PCA	0.005	Small	0.261	Medium	0.077	Small
PEE	0.248	Medium				
PIE	0.046	Small				

Table 4.11: Effect Size (f^2)

4.5.5 Assessing the Predictive Relevance (Q^2)

The researcher further assessed the model's predictive power by calculating the predictive relevance (Q^2) of the path model (Geisser, 1974; Hair et al., 2018; Ringle et al., 2012; Stone, 1974). The Q^2 is a criterion to explain how well a model predicts the data of omitted cases (Chin, 1998). As such, the blindfolding procedure with an omission distance of seven was run to obtain the cross-validated redundancy of all the reflective endogenous variables. A research model with Q^2 value(s) greater than zero is considered to have predictive relevance, and generally, Q^2 values of 0.02, 0.15, and 0.35 reveal a small, medium, and large predictive relevance of the model (Henseler et al., 2009).

As shown in Table 4.12, the cross-validation redundancy measure of Q^2 for all reflective endogenous variables were above zero. Career success had a Q^2 of 0.259; perceived external employability had a Q^2 of 0.209; and perceived internal employability had a Q^2 of 0.186 (refer to Appendix 13). Overall, all the Q^2 values were larger than zero, suggesting the predictive relevance of the model. More specifically, the research model exhibited acceptable fit with medium predictive relevance.

	SSO	SSE	Q^2 (1-SSE/SSO)
CS	2,304.00	1,706.42	0.259
PEE	1,728.00	1,367.65	0.209
PIE	01,152.00	938.10	0.186

Table 4.12: Q^2 Values

Table 4.13 summarises the results of the assessment of the structural model. The results affirm that three out of the four exogenous constructs (organisational learning practices, perceived external employability, and perceived internal employability) demonstrated significant positive effects on academics' career success, but a protean career attitude was found not significant for career success. However, protean career attitude was positively related to perceived internal and external employability ($\beta = 0.412$). Organisational learning practices were also found to be positively related to perceived internal and external employability to perceive internal and external employability ($\beta = 0.412$). Organisational learning practices were also found to be positively related to perceived internal and external employability but signified a higher influence on perceived internal employability ($\beta = 0.489$). Furthermore, the structural model satisfactorily explained the variance in academics' career success (56.3%), while the remaining endogenous variables were also substantially explained by the model (PEE = 40.7%; PIE = 36.1%). Overall, the model exhibited acceptable fit and predictive relevance since all the *Q*² values were larger than zero.

Path	Std. Beta	Std. Error	t-value	R ²	f²	Q^2
PCA -> CS	0.057	0.046	1.251	0.563	0.005	0.259
OLP -> CS	0.193	0.057	3.362*		0.055	
PEE -> CS	0.459	0.051	9.027*		0.248	
PIE -> CS	0.190	0.051	3.706*		0.046	
PCA -> PEE	0.412	0.047	8.825*	0.407	0.261	0.209
OLP -> PEE	0.379	0.049	7.705*		0.220	
PCA -> PIE	0.232	0.051	4.503*	0.361	0.077	0.186
OLP -> PIE	0.489	0.051	9.515*		0.340	

Table 4.13: Results of Structural Model Assessment

Note: *Significant at p<0.05, t>1.645, one-tailed

In this study, eight direct hypotheses were developed, seven of which were found to be supported by significant positive relationships (H2, H3, H4, H5, H6, H7, & H8) (see Table 4.14). However, the relationship between a protean career attitude and career success was not significant, thus rejecting H1. The summary of the results for the direct hypotheses is presented in Table 4.14.

Table 4.14: Results of (Direct) Hypotheses Testing

	Hypothesis Statements	Results
H1	There is a positive relationship between a protean career attitude and academics' career success	Not supported
H2	There is a positive relationship between organisational learning practices and academics' career success.	Supported
H3	There is a positive relationship between perceived internal employability and academics' career success.	Supported

H4	There is a positive relationship between perceived external employability and academics' career success.	Supported
Н5	There is a positive relationship between a protean career attitude and perceived internal employability.	Supported
H6	There is a positive relationship between a protean career attitude and perceived external employability.	Supported
H7	There is a positive relationship between organisational learning practices and perceived internal employability.	Supported
H8	There is a positive relationship between organisational learning practices and perceived external employability.	Supported

4.6 Mediation Analysis

The mediation analysis procedure suggested by Preacher and Hayes (2008) and Zhao et al. (2010) was applied in estimating the mediating effects of perceived internal employability and perceived external employability in the present model. The significance of indirect effects were tested using the bootstrapping procedure to capture the t-value and bias-corrected and accelerated (BCa) confidence intervals as recommended by past researchers (Hair et al., 2017; Preacher & Hayes, 2008; Zhao et al., 2010). A statistically significant p-value (< 0.05) and t-value (> 1.96 for two-tailed) indicates evidence of mediation. Furthermore, the 95% bias-corrected bootstrap confidence interval for the indirect effects should not include zero to support the presence of mediation.

4.6.1. Significance of the Indirect Effects

As shown in Table 4.15, the bootstrapping analysis revealed that both the indirect effects of organisational learning practices ($\beta = 0.267$, t = 6.431) and protean career attitude ($\beta = 0.233$, t = 7.294) on career success were significant, proving the existence of mediating effects. Furthermore, the results for the 95% bias corrected bootstrap confidence interval for the indirect effects (OLP \rightarrow CS, 0.185, 0.345; PCA \rightarrow CS, 0.185, 0.312) did not straddle zero. Thus, the researcher concluded that the presence of mediation effects are statistically significant.

	Indirect Effects	t-Values	p-Values	95% Confidence Interval	Significance (p<0.05)
OLP -> CS	0.267	6.431	0.000	[0.185, 0.345]	Yes
PCA -> CS	0.233	7.294	0.000	[0.185, 0.312]	Yes

 Table 4.15: Indirect Effect (Bootstrapping)

4.6.2 Multiple Mediation Analysis

In this study, the research model included two mediators (perceived internal employability and perceived external employability) with multiple linkages between the independent variables, mediators, and dependent variable. Reliance on a simple mediation analysis was unable to reveal the true mediation effects. Therefore, the multiple mediation procedure recommended by recent studies (Hair et al., 2018; Hayes, 2009; Nitzl et al., 2016) was performed to gain further insights into the multiple mediation effects of perceived internal employability and perceived external employability on career success.

As shown in Table 4.16, the results of the specific indirect effects, total indirect effects, and total effects of the independent variables on the dependent variable via the mediators are reported. The results revealed that the four specific indirect effects were significantly supported (PCA \rightarrow PIE \rightarrow CS, $\beta = 0.044$, t = 3.117; PCA \rightarrow PEE \rightarrow CS, $\beta = 0.189$, t = 6.568; OLP \rightarrow PIE \rightarrow CS, $\beta = 0.093$, t = 3.114; OLP \rightarrow PEE \rightarrow CS, $\beta = 0.174$, t = 5.827). Moreover, the total indirect effects were significant (PCA \rightarrow CS, $\beta = 0.233$, t = 7.294; OLP \rightarrow CS, $\beta = 0.267$, t = 6.431), as were the total effects of a protean career attitude ($\beta = 0.291$, t = 6.240) and organisational learning practices ($\beta = 0.460$, t = 8.446) on career success.

Mediation Path	Specific	Total Indirect	Total	95% Confidence
	Indirect Effect	Effect	Effect	Interval
PCA -> PEE->	0.189*	0.233*	0.291*	[0.145, 0.262]
CS	(t = 6.568)	(t = 7.294)	(t = 6.240)	
PCA -> PIE-> CS	0.044* (t = 3.117)			[0.023, 0.081]
OLP -> PEE->	0.174*	0.267*	0.460*	[0.114, 0.226]
CS	(t = 5.827)	(t = 6.431)	(t = 8.446)	
OLP -> PIE-> CS	0.093* (t = 3.114)			[0.041, 0.158]

 Table 4.16: Results of Multiple Mediation Analysis

Note: *significant at p<0.05, t>1.96, two-tailed

These findings provide empirical support for the existence of the mediating effects of both perceived internal employability and perceived external employability in the career success model. As such, the findings validate the indirect (mediation) hypotheses and conclude that all the mediation hypotheses (H9, H10, H11 and H12) were supported.

A summary of the results for the indirect hypotheses is presented in Table

4.17.

	Hypotheses Statements	Results
H9	Perceived internal employability mediates the relationship between a protean career attitude and academics' career success.	Supported
H10	Perceived external employability mediates the relationship between a protean career attitude and academics' career success.	Supported
H11	Perceived internal employability mediates the relationship between organisational learning practices and academics' career success.	Supported
H12	Perceived external employability mediates the relationship between organisational learning practices and academics' career success.	Supported

Table 4.17: Results of Mediation Hypotheses Testing

4.6.3. Comparison of Specific Mediating Effects

To test the strength or magnitude of mediation, the researcher incorporated the VAF method to compute the ratio of the indirect-to-total effect. Figure 4.6 illustrates the magnitude of mediation for perceived internal employability and perceived external employability between protean career attitude and career success. The VAF for perceived internal employability (0.044 / 0.291) was 0.15, while the VAF for perceived external employability (0.189 / 0.291) was 0.65. The sum of VAFs (0.15 + 0.65) indicates that almost 80% of the total effect for this path (PCA \rightarrow CS) is due to the joint mediation effects. To answer research question six, the strength of mediation results further confirm that the perception of external employability has a greater mediating effect than internal employability on the path relating protean career attitude to career success.



Figure 4.6: Magnitudes of Mediation Effects for Indirect Path (PCA \rightarrow CS)

On the other hand, Figure 4.7 shows the magnitude of mediation for perceived internal employability and perceived external employability between organisational learning practices and career success. The VAF for perceived internal employability (0.093 / 0.460) was 0.202 while the VAF for perceived external employability (0.174 / 0.460) was 0.378. The sum of VAFs (0.202 + 0.378 = 0.58) shows that almost 58% of the total effect for this path (OLP \rightarrow CS) was a result of the joint mediation effect. To answer research question seven, the strength of mediation results show that perceived external employability had a greater mediating effect than perceived internal employability on the path relating organisational learning practices to career success.



Specific indirect effect $PEE = 0.379 \times 0.459 = 0.174$ Specific indirect effect $PIE = 0.489 \times 0.190 = 0.093$

Figure 4.7: Magnitudes of Mediation Effects for Indirect Path (OLP \rightarrow CS)

The researcher further tested the statistical difference between the mediating effects of perceived external employability (M1) and perceived internal employability (M2) by comparing both constructs' mediation effects. The statistical difference was estimated using a spreadsheet application (refer to Appendix 8) to calculate the percentile and bias-corrected confidence intervals with the help of the bootstrapping function in the PLS programme, as suggested by Cepeda-Carrion et al. (2018) and Rodríguez-Entrena et al. (2016).

As shown in Table 4.18, the results indicate that there appeared to be a significant differential mediating impact between perceived external employability (M1) and perceived internal employability (M2) in the relationship between protean career attitude and career success, as both confidence intervals did not contain zero. Similarly, a significant differential mediating impact was produced between perceived external employability (M1) and perceived internal employability (M2) in the relationship between organisational learning practices and career success, as zero was not included in both confidence intervals. Accordingly, the researcher concluded that there is a difference between these two specific indirect (mediating) effects, such that perceived external employability (M2) on the influences of the independent variables (protean career attitude and organisational learning practices) on the dependent variable (career success).

Path	Differential Effect	Coefficient	95% Bootstrap CI			
			Per	centile	Bias (Corrected
PCA -> CS	M1 - M2	0.145	0.089	0.194	0.093	0.198
OLP -> CS	M1 - M2	0.081	0.017	0.157	0.011	0.151

 Table 4.18: Comparison of Mediating Effects

4.7 Chapter Summary

This chapter has described the empirical findings from the analysis conducted using SPSS version 22 and SmartPLS 3.0. The results of preliminary analysis (i.e., normality test and common method bias) and descriptive statistics of the respondents' profile were reported. In addition, estimations of the reliability and validity of the measurement model and HCM, validation of the structural model and mediation model, and finally testing of the hypotheses were performed using SmartPLS 3.0.

The findings provide adequate support for the measurements' reliability and validity. Composite reliability for all constructs was higher than 0.70, demonstrating internal consistency. All indicators were reliable with loadings above 0.60 and significant at $\alpha < 0.05$. The reflective measurement model also demonstrated convergent validity by having AVE values greater than 0.50. Similarly, the model showed discriminant validity where the HTMT values for all constructs were lower than 0.85. Furthermore, the estimation of the HCM for

organisational learning practices, using the repeated indicator approach, proved the reliability and validity of lower-order (reflective) constructs (CR > 0.70, AVE > 0.50, and $HTMT_{0.85}$). Moreover, the appropriateness of the higher-order construct was evident from its convergent validity, lack of collinearity issues (VIF < 3.3) among its lower-order constructs, and significance and relevance of the lower-order constructs (t-values >1.96 and p-values <0.05) to the higher-order construct.

The assessment of the structural model also showed satisfactory results. The R^2 values for the endogenous constructs perceived external employability (0.407), perceived internal employability (0.361), and career success (0.563) suggest that the path model moderately explained the variance of these key constructs. Besides, all constructs' Q^2 values were larger than zero, meaning that the model exhibited acceptable fit with medium predictive relevance. Furthermore, the estimation of the mediation model revealed that both perceived internal employability and perceived external employability have significant mediating effects on career success, especially perceived external employability. Finally, all the tested hypotheses (i.e., H2, H3, H4, H5, H6, H7, H8, H9, H10, H11, & H12) were supported, except for H1.

The next chapter provides a detailed discussion of the findings and their implications.

CHAPTER 5

DISCUSSION AND CONCLUSIONS

5.1 Introduction

The main objective of this study was to examine the integrated impacts of a protean career attitude, organisational learning practices, and perceived (internal and external) employability on academic staff' career success in PHEIs. Specifically, in bridging the existing research gaps to investigate the role of perceived employability, the researcher addressed the distinction between perceived internal employability and perceived external employability by distinguishing and comparing the direct and indirect (i.e., mediating) effects of both constructs on academics' career success.

A self-reported survey approach was used to gather individual academic staff's perceptions about their protean career attitude, organisational learning practices, perceived internal and external employability, and career success. These perceptions were then analysed with specific statistical tools (i.e., SPSS 22 and SmartPLS 3.0) to validate the proposed research model and test the stipulated hypotheses to address the research objectives in this study.

This chapter starts with a summary of the hypotheses in view of the findings obtained from the data analysis. Detailed discussions of the hypotheses pertaining to the research objectives outlined in Chapter One are structured into individual subsections and presented in this chapter. Arguments and analysis of the findings are also made in light of existing literature. Finally, this chapter ends with a summary of the chapter.

5.2. Summary of Hypotheses Testing

The results of the structural model assessment, more specifically, the assessments of direct path coefficients affirmed that all proposed direct hypotheses (H2, H3, H4, H5, H6, H7 and H8) were supported (p < 0.05, t > 1.645, one-tailed), except for H1. All the supported hypotheses showed the same positive direction with path coefficient values (β) ranging from 0.190 to 0.489. Furthermore, the results of the mediation analysis also showed that all the mediation hypotheses (H9, H10, H11 and H12) were supported with significant mediation effects (p < 0.05, t > 1.96, two-tailed), further evidenced by BC confidence intervals that did not include zero.

The summary of hypotheses testing consistent with the research objectives of the present study is presented in Table 5.1.

Table 5.1: Hypotheses Testing in Line with Research Objectives

Research Objectives (RO) and Hypotheses Statements Results

RO 1: To investigate the influence of a protean career attitude and organisational learning practices on academic staff's career success, with a comparison of the weight of influence of both factors.

H1	There is a positive relationship between a protean career attitude and academics' career success.	Not supported
H2	There is a positive relationship between organisational learning practices and academics' career success.	Supported

RO 2: To examine the influence of perceived internal employability and perceived external employability on academic staff's career success, with a comparison of the degree of influence of both factors.

- **H3** There is a positive relationship between perceived *Supported* internal employability and academics' career success.
- **H4** There is a positive relationship between perceived *Supported* external employability and academics' career success.

RO 3: To examine the influence of a protean career attitude on academic staff's perceived internal employability and perceived external employability to understand if protean individuals have different responses to their perception of internal versus external employability.

- **H5** There is a positive relationship between a protean career *Supported* attitude and perceived internal employability.
- **H6** There is a positive relationship between a protean career *Supported* attitude and perceived external employability.

RO 4: To examine the influence of organisational learning practices on academic staff's perceived internal employability and perceived external employability to understand how these practices affect perceptions of internal versus external employability differently.

- **H7** There is a positive relationship between organisational *Supported* learning practices and perceived internal employability.
- **H8** There is a positive relationship between organisational *Supported* learning practices and perceived external employability.

RO 5: To explore the mediating roles of perceived internal employability and perceived external employability in the relationship between a protean career attitude and academic staff's career success.

- **H9** Perceived internal employability mediates the *Supported* relationship between a protean career attitude and academics' career success.
- **H10** Perceived external employability mediates the *Supported* relationship between a protean career attitude and academics' career success.

RO 6: To explore the mediating roles of perceived internal employability and perceived external employability in the relationship between organisational learning practices and academic staff's career success.

H11 Perceived internal employability mediates the *Supported* relationship between organisational learning practices and academics' career success. H12 Perceived external employability mediates Supported the relationship between organisational learning practices and academics' career success.

5.3 Discussion of the Findings

In this section, a detailed discussion on the results reported in Chapter Four

is presented following the research objectives outlined in Chapter One. The results

are discussed in consideration of previous studies and the existing literature.

5.3.1 Research Objective One

"To investigate the influence of a protean career attitude and organisational learning practices on academic's staff career success, with a comparison of the weight of influence of both factors."

Relationship between Protean Career Attitude and Career Success

In this study, the researcher assumed that both a protean career attitude and organisational learning practices have a significant influence on academic staff's career success. However, the results show that only organisational learning practices have a positive influence ($\beta = 0.193$, t > 1.645, p < 0.05) on academic staff's career success, while a protean career attitude has a non-significant direct effect ($\beta = 0.057$, t < 1.645, p > 0.05) on career success. This contrasts the idea that an individualistic career leads to positive implications for career success. A possible explanation might be that a protean career attitude leads to more success in one's career, but subjective (psychological) career success rather than objective career success (Cortellazzo et al., 2020; Hall et al., 2018; Herrmann et al., 2015; Kuron, Schweitzer, Lyons, & Ng, 2016). Several studies on protean and boundaryless career orientations (PBCO) have also reported a weak relation between PBCO and objective career success (Baruch & Lavi-Steiner, 2015; Hall et al., 2018). Furthermore, as noted by Wiernik and Kostal (2019), protean individuals are more

concerned with the psychological (subjective) criteria of success, such as job satisfaction and life satisfaction, as opposed to extrinsic rewards.

The present study conceptualised career success from both objective and subjective aspects. Since a protean career attitude is more commonly associated with subjective career success as reported in the past studies, in this study, a protean career attitude might not be related to some of the objective indicators of academics' career success, such as the number of publications, earnings (salary) and career advancement (promotion). Subsequently, this may have contributed to the overall non-significant link between a protean career attitude and academics' career success.

Also, under the new career context, a successful career is not seen in terms of secure employment within a single organisation anymore, but as being continuously employable in the internal and external labour market (Cerdin et al., 2020; Kirves et al., 2014; Soares & Mosquera, 2020). Modern career theories such as the protean career (Hall, 2004), boundaryless career (Arthur & Rousseau, 1996), kaleidoscope career (Mainiero & Sullivan, 2005), and career mobility (Feldman, 2007) all address employability as the key benchmark (or proxy) for career success. Moreover, several authors (Hogan et al., 2013; Lo Presti et al., 2019; Lo Presti & Pluviano, 2016) consider career success as a proximal outcome of employability, such that both employability and career success can be compensatory in nature (Olson & Shultz, 2013). Parallel with the above arguments, the findings of this study show that most (approximately 80%) of the potential effect of a protean career attitude on career success has been absorbed by perceived internal and external employability, leading to the non-significant direct relationship between protean career attitude and career success, but an overall significant indirect relationship (PCA \rightarrow PEE \rightarrow CS, $\beta = 0.189$, t = 6.568; PCA \rightarrow PIE \rightarrow CS, $\beta = 0.044$, t = 3.117; PCA \rightarrow CS, $\beta = 0.233$, t = 7.294) on career success via perceived internal and external employability. From this finding, it is therefore evident that academics with a protean career attitude carry the most responsibility and proactively manage their ongoing employability as a precondition to career success, instead of emphasising objective and subjective success indicators.

It should be noted that most career theories are developed in the Western context, based on the frame of reference of employees and management practices in Western culture – these assumptions may not apply to non-Western contexts (Baruch, 2014; Spurk et al., 2019; Tu, Forret, & Sullivan, 2006). In fact, there are cultural differences between Western and Asian employees, particularly in the Malaysian context which is framed by a highly collectivist culture (Noordin & Hamali, 2009; Poon, Briscoe, Abdul-Ghani, & Jones, 2015). The degree of collectivism in each society is expected to affect the employment relationship between an individual and his/her organisation, wherein people from a particular cultural context tend to have different perceived values and attitudes toward the organisation and work (Dries, 2011; Hofstede, 2001). Hence, cultural effects might

influence the results of this study, particularly on Malaysian academic staff's perceptions of a protean career.

A protean career attitude is characterised by agentic, protean inclinations that involve self-direction and value-orientation in one's career (Hall, 2004; Hall et al., 2018). This individualistic value is highly reflected in the Western-individualist context but may not be generalisable to an Asian-collectivist context like Malaysia (Poon et al., 2015). Moreover, Malaysian employees tend to prioritise group harmony, demonstrate greater emotional dependence on their organisation, and expect organisations to assume more responsibility for their work and career. People in collectivist nations like Malaysia are in fact more external in their locus of control and more likely to see themselves as passive avoiders of control, preferring to hold less control over their work and careers (Spector, 2002; Sultana & Malik, 2019).

Accordingly, this study strongly reflects Malaysian's collectivist culture, since the results suggest that academic staff in Malaysia perceive that their individualistic (protean) career attitude is not an important predictor of their career success. Instead, they are more likely to rely on the HEIs to manage their careers rather than emphasising their own values and pursuing independence and individual achievement. As such, it does not come as a surprise that there is a non-significant direct relationship between a protean career attitude and career success, whereas organisational learning practices emerge as a positive and significant predictor (β = 0.193, t > 1.645, p < 0.05) of academics' career success in Malaysia with a greater influence (β = 0.193) than a protean career attitude (β = 0.057).

Relationship between Organisational Learning Practices and Career Success

As discussed earlier, in collectivistic cultures, people are hesitant to take control and independently act on their work and careers. As such, the organisation is expected to play an important role in facilitating employees' career development by providing the necessary resources to support employees' pursuit of their career path. In addition, as stated by Douglas, Hall, and Yip (2016), careers are mostly developed within an organisation and are very much shaped by the organisation's culture and practices. In other words, organisations' career management practice is a powerful source influencing individual career motivations and behaviours, particularly the ways employees assess their success within the organisation. It is also suggested that organisations can enhance employees' commitment and perception of internal career prospects when they perceive sufficient career development opportunities offered by the organisation (Khan, Salleh, & Hemdi, 2016).

Accordingly, universities, as knowledge-intensive organisations, are embedded with learning organisation characteristics, such as the existence of a supportive learning atmosphere, concrete learning processes, and supportive learning leadership (Bratianu, 2018; Forest, 2002). These conditions create a powerful motivational system to encourage continuous learning among academics, which in turn propels academics towards the achievement of specific career outcomes (i.e., success). As stated by Santos (2016), insufficient support from universities and faculty members in research collaboration and research funding are some of the career barriers that hinder career success in academia. Many participants in Santos's (2016) study admitted that insufficient learning and developmental opportunities in universities may potentially affect their opportunities to be successful in terms of promotion and career advancement up the academic ladder. Undoubtedly, organisational learning practices, as expected, affect academics' career success.

Moreover, academics' key success index incorporates research and publications in indexed journals, research grants obtained, participation and paper presentation in international seminars and conferences, and professional services and networks (Baruch, 2020; Zacher et al., 2019). These unique career features require lengthy and systematic training and development programmes which are only available in institutions which have the power and resources (Krishnan & Maheswari, 2011). As such, most academics still depend on organisational learning practices or support in pursuing career success.

This finding has shown that organisational learning practices have a direct positive influence on academic staff's career success. Ergo, the better academics perceive their organisational support to be in terms of organisational learning practices, the more publications they produce, the higher recognition they gain from organisations and the society, the more worthy the work they perform, and the closer their progress towards meeting their career goals and achievement. The significant effect of organisational learning practices on career success is also consistent with numerous previous studies that have claimed a positive relationship between organisational learning practices and academics' career success (Abu Said et al., 2015; Arokiasamy et al., 2014; Rahman et al., 2016; Tee & Chan, 2016; Zafar & Mat, 2012).

Hence, with regards to the first research objective, this study confirms that organisational learning practices have a significant positive influence on Malaysian academics' career success, whereas a protean career attitude has no significant direct influence on Malaysian academics' career success. Subsequently, organisational learning practices carry more weight ($\beta = 0.193$) in predicting Malaysian academics' career success in comparison with a protean career attitude ($\beta = 0.057$).

5.3.2 Research Objective Two

"To examine influence of perceived internal employability and perceived external employability on academic staff's career success, with a comparison of the degree of influence of both factors."

Relationship between Perceived Internal Employability, Perceived External Employability, and Career Success

In response to the second research objective to investigate the roles of perceived employability and its subsequent outcomes, in this study, perceived employability was included as a distinct construct that predicts academics' career success. Some scholars (Guilbert et al., 2018; Lo Presti et al., 2019; Rothwell & Arnold, 2005) have expressed concern about the distinction between perceived employability and career success, highlighting that perceived employability is the route to future success, whereas career success is the assessment of success based on the accumulation of experience. Obviously, perceived employability and career success are two separate constructs, and perceived employability can be seen as a factor that increases the likelihood of employment success (Akkermans & Tims, 2017; Niu et al., 2019).

This study validates that both perceived internal employability ($\beta = 0.190$, t > 1.645, p < 0.05) and perceived external employability ($\beta = 0.459$, t > 1.645, p < 0.05) are positively correlated with academics' career success. These findings are in line with previous studies in the employability literature (Cerdin et al., 2019; Clarke, 2017; Crews, 2016; Forrier & Sels, 2003; Kirves et al., 2014; Tee & Chan, 2016) that also found a statistically significant relationship between perceived employability and career success. Hence, in the new career context characterised by uncertainty and instability, academics' perception of their employability with

their current and/or future employers is one of the important predictors of career success. Indeed, most individuals believe that employability is able to increase the likelihood of successful employment by enhancing their future job prospects and mobility within and across the labour market (Clarke, 2017).

Furthermore, perceived employability in this study was segregated into perceived internal employability and perceived external employability, with the aim of testing whether these forms of employability contribute differently to academics' career success. The findings show that perceived external employability is the strongest predictor ($\beta = 0.459$) with highest effect size ($f^2 = 0.248$) on career success among all the independent variables (OLP \rightarrow CS, $\beta = 0.193$; PCA \rightarrow CS, $\beta = 0.057$; PIE \rightarrow CS, $\beta = 0.190$). In contrast, perceived internal employability only has a weak significant relationship with career success. Hence, the findings confirm the distinction between employees' perceptions of internal employability and external employability concerning their strength of associations with career success.

Applied to the current context, academics depend more on perceived external employability than internal employability in predicting their career success. The results also imply that academics are highly optimistic about their employability, and this was more the case for external than internal employability. This finding is again in line with the idea of individual agency that has gained more weight in modern career paradigms like the 'boundaryless' and 'protean' career. Modern employees have a high tendency to scan the environment and seek opportunities in the external labour market rather than in the internal workforce (Donald et al., 2017; Lin, 2015; Sultana & Malik, 2020).

With regards to the second research objective, this study provides clear empirical validation of the relationship between perceived internal employability, perceived external employability, and career success. The statistical results show that both perceived internal employability and perceived external employability have a significant positive direct relationship with career success. As such, the results empirically validate that both forms of employability are significant predictors of academics' career success.

On top of that, the researcher gained insight into the respondents' discernible perceptions of internal versus external employability. The findings demonstrate that perceived external employability has greater predictive value (β = 0.459) for academics' career success compared to perceived internal employability (β = 0.190), although the support for this is still relatively scant in previous works (Vanhercke et al., 2014). Thus, this finding sheds light on the pivotal role of perceived employability, specifically in response to the call of previous researchers to operationalise perceived employability by validating the distinction between perceived internal employability and perceived external employability (Forrier & Sels, 2003, Rothwell & Arnold, 2007; Vanhercke et al., 2014; Van Harten et al., 2020).

5.3.3 Research Objective Three

"To examine the influence of a protean career attitude on academic staff's perceived internal employability and perceived external employability to understand if protean individuals have different responses to their perception of internal versus external employability."

Relationship between Protean Career Attitude and Perceived (Internal and External) Employability

Given the growth of individualistic career management, the individual is now the main actor in managing his/her ongoing employability and career success. Consequently, individual characteristics and attitudes are often defined as the main predictors of employability and career success (Coetzee & Schreuder, 2017; Cortellazzo et al., 2020). This attests to the idea of dispositional employability (Fugate & Kinicki, 2008) which views a proactive attitude as one of the predictors of perceived employability. At a glance, the results indicate that a protean career attitude has a non-significant influence on career success, which appears inconsistent with the extant literature on modern careers. However, the findings further reveal the significant effect of a protean career attitude on perceived internal employability ($\beta = 0.232$, t > 1.645, p < 0.05) and perceived external employability ($\beta = 0.412$, t > 1.645, p < 0.05), mirroring the shift in the new employment relationship from lifelong employment to lifelong employability (De Cuyper et al., 2014). Apparently, perceived employability is considered an alternative (or compensation) for job security in the new career context, where both employability and career success can be compensatory in nature (Bozionelos et al., 2016; Hogan et al., 2013).

Furthermore, the research findings reveal that the impacts of a protean career attitude on career success are fully absorbed (mediated) by perceived internal and external employability, indicating a positive direct relationship between a protean career attitude and perceived internal and external employability. As far as protean career outcomes are concerned, the findings of this study align with previous research works that examined the influence of a protean career attitude on perceived employability (Bozionelos & Bozionelos, 2015; Cortellazzo et al., 2020; Direnzo et al., 2015; Eby et al., 2003; Lin, 2015; Sultana & Malik, 2020; Zafar & Mat, 2012), suggesting that protean individuals are more likely to take responsibility for their career progression by actively engaging in networking both internally and externally to search for job opportunities both inside and outside the organisation. The significant relationship between a protean career attitude and perceived internal and external employability also concurs with the Self-Determination Theory (Ryan & Deci, 2000), which suggests that individuals who are proactive, able to exert control (autonomy) over their work environment, and define their career according to personal values, are more self-motivated and energised in shaping their career development to optimise success and well-being

(Deci, Olafsen, & Ryan, 2017), which in this context refers to perceived employability.

Applied to this study, the relatively high levels of competition associated with the pursuit of an academic career, along with the internationalisation of higher education, have made the roles of academics multi-faceted. Academics are now taking a more proactive approach in mastering and upgrading their skills and adopting a self-driven approach to enhance their employment opportunities (or employability) in the market, particularly forging career progression across (internal) functional, departmental, and (external) organisational boundaries. Accordingly, the findings of this study show that academics with a protean career attitude can positively shape their perceived internal and external employability.

Extant research has suggested a direct positive relationship between protean attitude and perceived employability; however, only a few have examined whether a protean career attitude is related differently to perceived internal employability and perceived external employability (Chan & Dar, 2014; Van Harten et al., 2017). Indeed, the varying scope of both forms of employability may entail different predictors, outcomes, and processes (Vargas et al., 2018). Moreover, some researchers (Nimmi et al., 2020; Wiernik & Kostal, 2018) have observed an inconsistent link between a protean career attitude and physical mobility preferences. More specifically, there is a question of whether protean individuals

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are expected to enhance their own employability by deeply engaging with the internal organisation or by moving across organisational boundaries.

In answering the third research question, the findings of this study empirically confirm that a protean career attitude physically influences academics to have greater perceived external employability ($\beta = 0.412$) than perceived internal employability ($\beta = 0.232$). Many previous studies support this result, suggesting that highly protean individuals assume themselves as more capable of getting a job outside their organisations (Bozlonelos & Bozlonelos, 2015; Forrier, Sels, & Stynen, 2009; Lin, 2015; Shen & Hall, 2011; Sultana & Malik, 2020). A protean career attitude may contribute to career behaviours related to exploring career opportunities through networking with people outside their organisation to gain access to valuable social resources, which in turn lead to higher marketability in the external labour market (Hermann et al., 2015). This phenomenon is also reflected in the current academic career context, where academics are proactively participating in local and international conferences and engaging in collaborations with other (local and international) universities and industries, with the intention to access information, resources, and career sponsorship that might enhance their visibility and marketability in the external labour market. Indeed, Nyberg and Wright (2015) argued that individuals who proactively build their social capital (e.g. networking) can add value through relationships or the "goodwill" others have for the individual. This social capital works simultaneously with human capital to

maximise the individual's marketability and success in his/her career (Nyberg, & Wright, 2015; Seibert, Kraimer, & Liden, 2001).

In view of macro-level circumstances, the higher education industry has grown tremendously, and many recent studies indicate the industry is suffering from a chronic shortage of quality academic staff, leading to a 'war for talent' that has become more relevant with growing competition among institutions in the recruitment and retention of academic and teaching positions (Edwards & Smith, 2010; Khalid, 2019; Van den Brink et al., 2013). This is particularly important in Malaysia, where higher education has increasingly become international in its perspectives (Munusamy & Hashim, 2019), in conjunction with the aim of the 2015-2025 Malaysia Education Blueprint for higher education to make Malaysia a global education destination that attracts 250,000 international students by 2025. Hence, the composition of academic staff is vitally important to match industry demands as well as the competitive position of HEIs. In this regard, academics with a protean career attitude should be able to scan employment opportunities in the external labour market and therefore, be highly optimistic about their employability across different universities in the higher education sector.

While changing jobs is an alternative through which protean individuals manage their career direction, some people do not do so just for the sake of maintaining visibility and external employability. Academics who are changeadverse might regard constant career navigation across different institutions as a manifestation of withdrawal behaviour or a low level of engagement with the attached institution (Baruch & Vardi, 2016). Also, frequent job transitions with too many short-circle career experiences may limit the chances for academics to reach a high level of achievement within an institution, such as career progression from senior lecturer to associate professor/professor. Moreover, academics are not able to crystallise a solid career identity if they move across different institutions frequently. Past studies (Light, 2005; Pazy, 1996) have found that employees who perform professional jobs (e.g., academics) prefer to stay within the organisation and engage in skill development activities to broaden their professional skills and competences and, consequently, ensure their employability within the organisation. As such, the findings of this study also show the significant relationship between a protean career attitude and perceived internal employability, albeit with smaller prediction value than perceived external employability.

Hence, with regards to the third research objective, this study confirms that a protean career attitude is positively associated with perceived internal and external employability. More specifically, academics with a high protean career attitude attempt to be more employable by pursuing a career outside organisational boundaries (external employability) rather than within the same organisation (internal employability).

5.3.4 Research Objective Four

"To examine the influence of organisational learning practices on academic staff's perceived internal employability and perceived external employability to understand how these practices affect perceptions of internal versus external employability differently."

Relationship between Organisational Learning Practices and Perceived (Internal and External) Employability

Undeniably, a protean career attitude is one of the main predictors of academics' perceived employability since the responsibility for managing employability primarily rests with the individual. Despite this fact, numerous studies have commented that career self-management should coexist with organisational career management practices to support the employability of staff members (Forrier et al., 2018; Lo Presti et al., 2019; Philippaers et al., 2017). Stimulating employees' occupational competence through organisational learning practices is thus considered an important measure to enhance perceived employability, which is a viewpoint supported by numerous scholars who underscore the importance of learning and development practices in enhancing employability (De Vos et al., 2017; Guilbert et al., 2018; Van der Heijden et al., 2015). Accordingly, the present study found that organisational learning practices positively predict perceived internal employability ($\beta = 0.489$, t > 1.645, p < 0.05)

and perceived external employability ($\beta = 0.379$, t > 1.645, p < 0.05). The findings reveal that academics today still expect the university to provide them learning and developmental support in research and publication, grant writing, and teaching and presentation skills to enhance their academic skills and ensure they remain employable within the institution as well as self-sufficient to cater to future competency needs in the industry or external labour market.

The university, as a knowledge-intensive organisation, should encourage academic staff to constantly improve their knowledge and skills in tandem with the changing expectations of stakeholders (Khalid, 2019). Also, academics, who are believed to have high professional and learning value (Peterson & Wiesenberg, 2004), should have a high level of knowledge and skills to perform their tasks professionally. Therefore, to assure they remain employable in the internal and external labour market, academics often have a strong tendency to seek continuous learning opportunities from the institution to fine-tune their expertise with up-todate knowledge and skills in addition to continuously building on new expertise requirements from the industry. This argument is consistent with that of Van der Heijde and Van der Heijden (2006), who conceptualised employability as a process of optimising career competencies to continuously fulfil, acquire, or create work in the labour markets. On top of that, the results of this study are consistent with previous studies on academic careers, confirming that organisational learning practices (opportunities) lead to or are able to enhance academic staff's perceived

employability (Hodkinson & Taylor, 2002; Tee & Chan, 2016; Van der Klink et al., 2014; Zafar & Mat, 2012).

To deepen our understanding of the impact of organisational learning practices on perceived internal and external employability, in answering research question four, this study verifies that organisational learning practices have a greater impact on perceived internal employability ($\beta = 0.489$) than perceived external employability ($\beta = 0.379$). These results clearly contrast the finding that a protean career attitude has a greater impact on perceived external employability (β = 0.412) than perceived internal employability ($\beta = 0.232$). These differentiated results are supported by the arguments of previous scholars (Clarke, 2018; Forrier et al., 2018; Van Harten et al., 2020) that both perceived internal and external employability are caused by a different set and combination of individual and organisational factors. Indeed, employees are responsible for managing their employability in the external labour market, since external employability is built upon generic skills and knowledge that make a person attractive to other employers beyond the current organisation. In contrast, both employees and employers share the responsibility of managing internal employability, where employers provide training and development opportunities while employees contribute by grasping such opportunities (Van den Broeck et al., 2014).

Furthermore, the researcher notably highlights the findings from the social exchange and norm of reciprocity perspective (Cropanzano & Mitchell, 2005),

assuming the employment relationship is an exchange between employer and employee. If academics perceive that the institution is concerned with their intrinsic values by providing a supportive learning environment and rewarding their efforts (e.g., sponsorship for conferences and seminars, training for publication in high indexed journal, encouragement for collaboration), the academics are likely to reciprocate by staying loyal and pursuing job opportunities within the institution, thus heightening their perceived internal employability. Similarly, from the signalling theory (Biron et al., 2011; Spence, 1973) perspective, organisational learning practices offered by the employer can be perceived as a signal that the organisation is keen to develop its employees, so employees are likely to perceive that their organisation values them and provides them better internal opportunities, which in turn, leads to higher perceived internal employability.

Additionally, to cater to the demand for greater modernisation and adaptability of skills and knowledge in the new career context (Ahmad et al., 2018), the academic community needs to prepare themselves for new requirements for knowledge generation, innovation, and intellectual property transfer to society at large (Shamsir & Ismail, 2013). Some academics may fear skill obsolescence and lack confidence in the ability of their current knowledge and skills to fulfil the demands of the external labour market (Kim et al., 2015; Pazy, 1996). Thus, they prefer to stay within the institution, seeking training and development opportunities from the institution to broaden their professional competence, consequently reporting higher levels of perceived internal employability. These employees are
more likely to take a 'developmental' approach to accumulate internal employment capabilities within the organisation before seeking external employment opportunities (Lin, 2015; Nelissen et al., 2016).

Hence, with regards to the fourth research objective, this study confirms that organisational learning practices are positively associated with perceived internal and external employability. More specifically, to clarify the concerns related to the employability paradox (De Cuyper et al., 2014), the findings suggest that academics are more likely to pursue their career within the organisation (internal employability) if they see more learning and development opportunities available in the institution. Evidently, organisational learning practices primarily aim to enhance internal employability; however, academics' participation in organisation-specific projects such as publication opportunities and internal seminars/conferences also grants them knowledge and skills that can be transferred to other institutions. As such, even though most organisational learning practices are internally oriented (Akkermans et al., 2019; Kraaijenbrink et al., 2010), they do foster academic staff's increased marketability in the external labour market (perceived external employability).

5.3.5 Research Objectives Five and Six

"To explore the mediating roles of perceived internal employability and perceived external employability in the relationship between a protean career attitude/organisational learning practices and academic staff's career success."

This study adopted the SCCT-CSM model (Lent & Brown, 2006, 2008) to build a more comprehensive understanding of academics' career management by considering how individual factors (i.e., protean career attitude) and organisational factors (i.e., organisational learning practices) influence career outcomes (i.e., career success) via self-efficacy beliefs (i.e., perceived internal and external employability). Like the predictions of the SCCT, perceived internal and external employability can be viewed as the self-efficacy perception about a person's ability to find a new job with another employer or to remain employable with the current employer. In this sense, enhancing the perception of employability may increase the likelihood of career success. Greater emphasis on the mediating mechanisms in the present study contributes to a more comprehensive understanding of the role of perceived employability in the testing and implication of the extended SCCT model.

Given the contemporary employment landscape that is known to have uncertain and insecure employment relations, vocational psychology must now pay attention to employability rather than employment (Van Harten et al., 2020). Perceived employability has emerged as an essential aspect of career management in the new career landscape. Concurrent with the proposition to study the inputs and outputs of employability (Ngo, Liu, & Francis, 2017), in this study, the inclusion of perceived internal and external employability as mediators played an imperative role in explaining the predictive value of a protean career attitude (individual factor) and organisational learning practices (organisation factor) as the inputs to perceived employability, with academics' career success as the outcome (output) of perceived employability.

Perceived (Internal and External) Employability Mediates the Relationship between a Protean Career Attitude and Career Success

The researcher tested the mediating effects of perceived internal employability and perceived external employability following the procedure suggested by Preacher and Hayes (2008) and Zhao et al. (2010). Based on the statistical results, the direct relationships between (1) protean career attitude and perceived internal employability; (2) protean career attitude and perceived external employability; (3) perceived internal employability and career success; and (4) perceived external employability and career success, were tested and found to be positively related (t > 1.645, p < 0.05), except for (5) protean career attitude and career success that was found to be not significantly related. The indirect effects of perceived internal employability and perceived external employability between a protean career attitude and career success as well as its total indirect effect were also found significant (t > 1.96, p < 0.05), meaning that the prerequisites for

mediation were met and the existence of mediating effects was validated. Since the direct effect of a protean career attitude on career success was not significant, the researcher concluded that perceived internal employability and perceived external employability mediate most of the impacts of a protean career attitude on career success.

To meet the research objectives, the researcher compared the magnitude of mediating effects between perceived internal employability and perceived external employability, finding a significant difference between both mediators. The findings of the indirect effects (as shown in Table 4.16) report that perceived external employability ($\beta = 0.189$) has a greater mediation impact than perceived internal employability ($\beta = 0.044$). Indeed, the inclusion of perceived internal employability and perceived external employability as mediators and distinguishing their predictive values play an imperative role in explaining academics' career success.

This study discovered that protean individuals respond differently to their perception of internal employability and external employability in determining their success in academia. The impact of a protean career attitude on career success is mostly (about 65%) absorbed by perceived external employability and only slightly (15%) by perceived internal employability. In other words, employees perceive themselves to be highly valuable in the external labour market rather than within the existing institution in their career development and success. This finding is congruent with recent career studies suggesting that protean individuals are more likely to manage their employability beyond the organisational boundary and embrace greater inter-firm transition as a precondition to career success (Guilbert et al., 2018; Hall et al., 2018; Sultana & Malik, 2019). In fact, some researchers (Clarke, 2018; Coetzee & Engelbrecht, 2019; Eby et al., 2004) found that career attitudes like flexibility, adaptability, and proactiveness possessed by employable individuals are considered common characteristics that facilitate external marketability, help them adjust to inter-firm transitions, and support their career mobility for future success. The finding therefore suggests that Malaysian academics in a protean career landscape view external employability as more important than internal employability as the key benchmark for career success. With these findings, the researcher concluded that academics with a protean career attitude are more enthusiastic about pursuing their career beyond organisational boundaries rather than within the institution.

Perceived (Internal and External) Employability Mediates the Relationship between Organisational Learning Practices and Career Success

Statistical results show that all the direct relationships between (1) organisational learning practices and perceived internal employability; (2) organisational learning practices and perceived external employability; (3) perceived internal employability and career success; (4) perceived external employability and career success; and (5) organisational learning practices and

career success were found to be significantly positive (t > 1.645, p < 0.05). Moreover, the indirect effects of perceived internal and external employability as well as the total indirect effect (OLP \rightarrow CS) were significant as well (t > 1.96, p < 0.05). As such, the findings provide validation for the mediating effects of both perceived internal employability and perceived external employability along the path between organisational learning practices and career success. These results are consistent with most previous studies that used perceived employability as a mediating variable in the link between organisational learning practices and career success and career success (De Vos et al., 2011; Tee & Chan, 2016; Zafar & Mat, 2012).

As noted in the previous chapter, past research has indeed pointed out that the chain of organisational learning practices–perceived employability–career success is more plausible for internal employability but less so for external employability (Cerdin et al., 2020; De Vos et al., 2011). This is because most organisational learning practices are internal-oriented (Akkermans et al., 2019; Kraaijenbrink et al., 2010) to enhance employees' occupational skills in performing their current jobs effectively, so that they are likely to perceive more internal mobility opportunities and build their career within the organisation. Furthermore, the results concerning the direct relationship between organisational learning practices and perceived internal and external employability also reveal that organisational learning practices have a greater impact on academics' perceived internal employability ($\beta = 0.489$) than perceived external employability ($\beta =$ 0.379), which aligns with theories such as the Social Exchange Theory (Blau, 1964) and the Signaling Theory (Spence, 1973).

However, the finding on the mediation test reported that the VAF for perceived internal employability's indirect effects was only 0.202, whereas the VAF for perceived external employability was 0.378, indicating that perceived external employability has a stronger mediating effect on the link between organisational learning practices and career success. It is surprising that while organisational learning practices produce a greater direct impact on perceived internal employability, academic staff still rely more on perceived external employability to determine their career success. The inclusion of both perceived internal and external employability as mediators demonstrates that perceived external employability has a more dominant mediating effect on academic career success compared to perceived internal employability. This result is interesting since the role of perceived internal employability has been substituted by perceived external employability when both are entered into the regression model between organisational learning practices and career success. These findings suggest that academics' career success is more likely driven by something other than remaining employable within the institution and feeling obligated to reciprocate the training and development support from the organisation, as proposed by the social exchange and signalling theories. The inconsistent findings could be explained in two possible ways.

First, it should be noted that even though most academic training and development programmes are occupationally specific and internal-oriented, these occupational skills have greater transferable potential within an occupational cluster (i.e., academia) and are more applicable to all workplace contexts within academia. Implicitly, academics are more likely to work in a supportive environment (e.g. easy access to training and publication opportunities) and continuously develop themselves internally while seeking employment opportunities beyond organisational boundaries to determine their future career success. Academic staff might feel that their occupational expertise (in teaching, research, and publication) accumulated from organisational learning practices is part of their movement capital (Forrier et al., 2015) that can add value to their employment profile, particularly for external marketability. Therefore, it is possible that besides internal employability, academics' career success is driven by the expectation of career advancement beyond the organisational boundary. This explanation is in line with the Conservation of Resources (COR) theory (Hobfoll, 1989; Hobfoll et al., 2018), which suggests that people have to invest resources to protect themselves against resource loss, recover from losses, and generate more resources that help them ultimately achieve their goals.

Second, the results may imply that academic staff are overly optimistic about employment opportunities in the external labour market, given the tremendous growth of the higher education industry in Malaysia and the intensifying 'war for talent' in academia due to the shortage of quality academic staff (Khalid, 2019; Van den Brink et al., 2013). This expanded view of career success is consistent with the basic premise of Forrier and Sels's (2003) employability process model, which states many employees view the current labour market condition as a reference point to assess their transition opportunities in the market. Consequently, academic staff in Malaysia might be placing more emphasis on perceived external employability to determine their career success.

To sum up, with regards to the fifth and sixth research objectives, this study confirms the mediating roles of both perceived internal and external employability in the path linking a protean career attitude and organisational learning practices to academics' career success. However, the impact of perceived internal employability was found to be substituted by perceived external employability in determining academics' career success. Notably, the results disclose that perceived internal and external employability absorb most (80%) of the impacts from a protean career attitude towards career success and mediates almost 58% of the relationship between organisational learning practices and career success. The inclusion of both mediators in the model provides a better understanding on the roles of employability and empirically verify that Malaysian academic staff have different perceptions of internal and external employability in determining their career success in academia. It is important to recognise that protean talents perceive more success in their career if they are provided the opportunity to develop their employability skills and experiences internally and externally. Also, the overall results in this study testify that perceived external employability serves as the most important predictor as well as the main buffer mediating the effects of a protean career attitude and organisational learning practices on the career success of academics in PHEIs in Malaysia.

5.4 Implications of Study

In response to the need for research on the role of employability in the new career era, this study aimed to investigate protean career attitude and organisational learning practices as independent variables, perceived internal and external employability as mediators, and career success as the outcome in the context of academia. Several useful implications were discovered from the results in the present study. The following section provides further insights into the theoretical and practical implications of this study.

5.4.1 Theoretical Implications

The results of this study reveal major findings that significantly contribute to the existing literature. This study used an integrative approach by exploring how individual factors (protean career attitude) and organisational factors (organisational learning practices) jointly influence perceived employability and career success in Malaysian academia. In doing so, this study has responded to suggestions to incorporate both individual and organisational career management perspectives in theoretical development (Baruch, 2006; Guo et al., 2019; Wesarat et al., 2014). Besides, the inclusion of perceived internal and external employability as mediators linking the independent variables (protean career attitude and organisational learning practices) to the dependent variable (career success) is particularly relevant. Given that employability is widely viewed as the central tenet of contemporary employment relationships, perceived employability needs to be nurtured to achieve optimal well-being and career success (Bester, 2019; Kirves et al., 2014). By incorporating these five variables into academics' career success model, this study enriches the theoretical lens by integrating social cognitive, social exchange, management, and organisational psychology perspectives in explaining the phenomena behind academics' career success.

Some notable results from this study add to the body of knowledge on employability and career studies. The results reveal that protean career attitude is not a significant predictor, while organisational learning practices are a significant predictor of Malaysian academics' career success. Indeed, this finding challenges the widely held notion that a protean career always leads to career success. It appears that a majority of past career studies were conducted in the Western cultural context while the Malaysian context has been largely neglected. The findings suggest that the individualistic values inherent in the protean career attitude might not be applicable or generalisable among Malaysian academics since Malaysians are known to be highly collectivist and communal (Hofstede, 2001; Poon et al., 2015); therefore, they are more likely to assume less control over their work and career (Sultana & Malik, 2019). This would imply that the conceptualisation of career success and its predictors are rooted in the societal values and cultural contexts of the respondents. On the theoretical front, this sheds new light on the academic implications of recognising cross-national differences and explicitly highlights how a protean career orientation works across cultural boundaries, as suggested by Hall et al. (2018).

This study also explored the crucial role of perceived employability by inserting perceived internal and external employability as mediators in the influences of a protean career attitude and organisational learning practices on academics' career success. Distinguishing the direct and indirect (mediation) impacts of perceived internal employability and perceived external employability adds value to the prediction of career success. The findings contribute to a better understanding of Malaysian academics' tendency to refer to perceived internal and/or external employability to guide their career in academia. This study found that the presence of these mediators absorbs most of the impact of the protean career attitude and mediates the impact of organisational learning practice on academics' career success. Notably, perceived external employability carries the greatest direct and indirect effects on academics' career success. These results reveal that Malaysian academics place more emphasis on perceived external employability compared to other predictors to determine their success in academia. They tend to seek jobs across different universities in building their career paths and/or direction. Thus, this empirical result improves our theoretical understanding pertaining to academics' general feeling of perceived control over his/her career success, which

may be particularly important if future research aims to investigate the antecedents and outcomes associated with perceived employability.

Also, a noteworthy finding was that both perceived internal and external employability and career success are highly correlated, in line with the validation of Rothwell and Arnold (2007). Indeed, the findings concur with the commentaries of Olson and Shultz (2013) that both employability and career success can be compensatory in nature, reflecting the importance of enhancing individuals' perception of employability for career success. Perhaps, this finding hints yet again that enhancing perceived internal and external employability is imperative and equally important for academics' perception of success in an academic career. The integration of these four enablers gives a more comprehensive understanding of the determinants of academics' career success in today's career landscape. Also, it helps bridge the gaps in the career literature related to the separate influence of individual factors, organisational factors, and socio-cognitive factors.

This study contributes to the further development of an integrated model of employability by adapting the process model from Forrier and Sels (2003) to demonstrate the relationships among personal and structural factors and career success via perceived employability. This study adopted an input and output perspective to testify the factors (inputs) constituting perceived employability and its consequences (outputs). The implication is that both a protean career attitude (personal factor) and organisational learning practices (contextual factor) have greater impacts on perceived internal and external employability than career success. This may imply that as far as academics' career success is concerned, they are more concerned about better employment opportunities than other success indicators such as progression, monetary rewards, publications, and recognition. Taking a process model view of both perceived employability and career success, it can be deduced that academics who are relatively proactive and motivated to continuously develop themselves, and who perceive easy access to training and development support, are likely to perceive employment opportunities (i.e. high perceived employability) within and/or beyond organisational boundaries. This perception, in turn, allows the academics to further pursue their career goals and success.

The implications of the process model that links the concepts from the theoretical framework is that it improves the understanding of researchers and practitioners on the antecedents and consequences of perceived employability. The findings of this study provide evidence that both personal and structural approaches to employability may be considered as important resources for academics in managing their perceived employability, while perceived employability is portrayed as a key antecedent of career success. In this respect, the present study proves relevant in guiding academics' career success based on the COR theory by Hobfoll (1989), under the assumption that perceived internal and external employability are individual resources that help employees retain and/or generate more resources that engender well-being. As such, future research might adapt the

ideas from the COR to employability enhancement to provide a more complete picture on how the organisation interacts with the individual to utilise and preserve their resources for better future career and organisational performance.

This study also contributes to the literature on the employability management paradox. The researcher addressed the key tenet of the employability paradox (De Cuyper & De Witte, 2011) by exploring how organisational learning practices (or investments) benefit employees by enhancing their employability perceptions both internally and externally. By distinguishing internal from external perceptions of employability, this study further adds to the understanding of the employability paradox. Specifically, it suggests that both a protean career attitude and organisational learning practices enhance perceived internal and external employability, with organisational learning practices having a greater impact on perceived internal employability than perceived external employability. This result is in line with the social exchange and signalling theories, which posit that organisational investments in training and development initiatives are perceived as a signal that academics are valuable to their current employers, thereby eliciting a norm of reciprocity that results in higher perceived internal employment opportunities (Cropanzano et al., 2017). Following the expectation of the employability paradox, the results show that both perceived internal and external employability positively mediate the relationship between organisational learning practices and career success. However, it was expected that organisational learning practices lead to higher career success via perceived internal employability rather than perceived external employability. The findings suggest otherwise. Indeed, perceived external employability has greater direct and mediating impacts on academics' career success.

This study, therefore, corroborates the idea underlying the employability paradox, namely that investment in organisational learning practices increase both perceived internal and external employability, yet poses unintended consequences if organisational learning practices feed external employability more, as it could pull competent academic staff out of the current employment relationship (De Cuyper & De Witte, 2011). Perhaps, the effect of internal employability may not be able to fulfil academics' career goals, and other forms of future opportunities in the external labour market (e.g., upward and lateral career transitions) may impact career success differently. Therefore, the findings put the employability paradox in perspective and shed more light on the employability-career success relationship. More theoretical refinement and empirical research are needed with regards to the roles of perceived internal and external employability in determining academics' career success and concurrently creating a mutual win-win situation for PHEIs that invest in employability enhancement and its academic staff's future success and well-being.

This study also has theoretical implications in terms of developing a career management model using the subsets of the SCCT-CSM model, as it has validated the predictability and applicability of the SCCT-CSM in the academic context. Derived from Bandura's (1986) social cognitive theory and Lent and Brown's (2013) SCCT-CSM model, this study adopted the core social cognitive construct (self-efficacy beliefs) from the model and integrated it with personal and contextual variables in a singular model to predict academics' career success. Perceived internal and external employability (representing self-efficacy beliefs) were modelled as mediators and were distinctly measured in terms of predictive value in determining and mediating academics' career success together with a protean career attitude (personal factor) and organisational learning practices (contextual factor), which further enhanced the applicability of the SCCT-CSM model in the present study.

Moreover, framing and testing mediation models are considered 'almost mandatory' for theory development in recent research trends (Bullock et al., 2010; Memon et al., 2018; Pieters, 2017). The results of this study lend strong support to SCCT's theorising on the roles of the social cognitive construct in the formation of career outcomes. The insignificant protean career attitude-career success relation was found to be fully mediated by perceived internal and external employability. Additionally, support was also found for the direct effect of organisational learning practices on career success beyond its indirect effect via perceived internal and external employability. Taken as a whole, these findings support SCCT's prediction that the effect of personal inputs (in this case, protean career attitude) and contextual inputs (in this case, organisational learning practices) on career success is mediated by self-efficacy beliefs (in this case, perceived internal and external employability), thus delineating the magnitude of the pathways linking personal and contextual variables, cognitive variables, and career success. Collectively, the present model builds on SCCT's body of research to constitute more comprehensive knowledge and a better understanding of academics' career success in Malaysia. Theoretically, this study contributes to knowledge enhancement in the area of career management, specifically extending the application of the SCCT-CSM model to employability and career studies, which is of considerable interest to researchers as well as practitioners.

5.4.2. Practical Implications

Beyond its theoretical contributions to the literature on career and employability management, this study also has several meaningful practical implications for individuals, HEIs, and the government in managing academics' employability and career success in Malaysian PHEIs. It is important to recognise that perceived employability and career success are shaped by factors tied to the academic (protean career attitude) as well as factors in a larger context, such as institutions' organisational learning practices. Academics are expected to adopt career attitudes and behaviours that are more flexible and proactive in managing their employability and career success under the new career trend that has everincreasing competitive pressures. Also, PHEIs should play their roles in managing employability among academics by offering opportunities for development and assisting them in navigating their career success within the institution and/or beyond organisational boundaries. These implications are captured from the results on the relationships between the variables in this study that are indeed significant and supported. The detailed practical implications are presented below.

Implications for Academic Staff

At the employee level, to manage their employability, academics need to be self-started, engage in proactive behaviours, and focus on preparing for the future by being flexible and adaptable, rather than being conservative and resistant to change. In practice, this means that academics need to be willing to accept new and challenging work assignments besides teaching and lecturing. Academics that have a great extent of knowledge in their field of study or in research should take initiatives to participate in consultation services for the government or for private corporate companies. As part of iconic projects in the private as well as government sectors, their contributions or advisories adopted or recommended by the advisory board are a form of rewards or recognition for academics. Moreover, academics represent their respective institutions when participating in such professional services, which may enhance the academics' internal visibility and marketability, and in turn, promote their engagement and retention within the institution. PHEIs will also gain recognition from the government and industry due to the contributions of their academic staff, which may motivate them to engage in more external collaborations and funding for the institutions. Since proactive individuals tend to seek career opportunities by regularly scanning the internal and external

labour market, active involvement in industry-related activities and consultation projects also enables academics to gain access to first-hand information related to government policies, the supply and demand of the labour market, and the updated skills required to match market demands, all of which strengthen the individual's position and capability to secure employment in the external labour market.

In addition, in today's knowledge economy, there is an increasing focus on career competencies, particularly for academics who are presumed to have high professional value. Academics need to proactively engage in skill maintenance and updating and should have a strong tendency to seek and engage in continuous learning from the institution to fine-tune their career competencies with up-to-date knowledge and skills. Academics are also required to continuously build new expertise requirements from the industry to reflect their employment capabilities in the internal and external labour market. Coetzee and Engelbrecht (2019) cite willingness and capacity to continually learn as qualities necessary for future employability in the present dynamic environment. Similarly, Parker, Khapova, and Arthur (2009) stated that protean individuals need to manage three 'knowing' career competencies, i.e., know why, know whom, and know how, to generate desired outcomes like career success. The 'know why' in the present study refers to career insight, suggesting that academics should have clear career goals in guiding their career decisions. For example, academics should be aware that working in academia is a unique career path that varies from other contexts such as corporate, public service, or industrial organisations. Academics typically have

high intrinsic work motivation, are more willing to accept a relatively lower salary, and more strongly value the recognitions and contribution of their work associated with the accomplishment of a meaningful (or successful) career. Therefore, academics must have clear and realistic career goals, actively reflect on their career goals, and gain stronger career insights into what they want to achieve in their career to achieve higher career success (Zacher et al., 2019).

The 'know whom' refers to networking with those inside and outside their institution, especially those able to assist academics in progressing in their work or career. In this regard, academics need to actively participate in networking opportunities, such as attending conferences and workshops where key academic representatives, corporate personnel, and participants from other universities are present. By building relationships with people both inside and outside the institution, academics can access valuable information and social resources that, in turn, lead to superior job performance, higher internal and external visibility and marketability, and higher levels of career success. Capturing these social capital resources simultaneously with human capital would maximise an individual's career success (Nyberg & Wright, 2015; Seibert, Kraimer, & Liden, 2001).

The 'know how' competency focuses on occupational or career-related skills and expertise that academics accumulate over time, which involves life-long learning by continuously upgrading their job-related and generic skills as well as other qualities or skill sets necessary to secure employability in the current and future landscape. For instance, academics need to constantly upgrade their skills in teaching, research and publication, communication, information technologies, flipped and blended classroom management, and paper presentation at international conferences, which are easily transferable across organisations. Research has demonstrated that individuals who possess a diversified set of career/job-related skills report higher levels of perceived employability (Kim et al., 2015) and career success (Abu Said et al., 2015; De Vos et al., 2011; Sultana & Malik, 2019).

Implications for Private Higher Education Institutions

At the organisational level, PHEIs should play their part in managing employability. That is, they should offer development opportunities to assist academics in navigating their career paths/success as part of the 'new psychological contract'. Applied to this study, the results indicate that PHEIs that adopt learning and development practices are able to enhance their academics' perceived employability and career success. From a practical standpoint, assessments of academic staff's perceived employability and distinguishing their perceived internal from external employability offers HEIs ways to explore how academics perceive future career possibilities, either as staying with the current employer and/or moving to other employers, which gives PHEIs a better understanding of the employability paradox. More specifically, the findings of this study question the core of the employability paradox which assumes that employability enhancement entails a risk for employers of losing their employees to competing organisations after investing resources in employees' learning and development practices (De Cuyper & De Witte, 2011).

The results of this study show that organisational learning practices enhance both perceived internal and external employability, but have greater impacts on perceived internal employability. Yet, there is a risk that organisational learning practices feed perceived external employability, but this paradox is relatively tentative since there is little support in the literature for the negative relationship between perceived external employability and employee commitment (Akkermans et al., 2019; Nelissen et al., 2016). Ergo, PHEIs should not overrate the employability paradox. Instead of being reluctant to invest in learning and development practices because of the fear of losing their employees, PHEIs should utilise organisational learning practices as signals for the academics that they are valued by the institution and have a good opportunity for growing their career within the institution. As suggested by Crowley-Henry et al. (2018), organisationlevel career development opportunities and support should be strategically tailored for high potential protean talents with boundaryless or traditional career orientations to reduce their turnover intention; this would facilitate the retention of talent within the organisation.

Whilst employers cannot control academics perceived external employability, they can undertake actions to promote internal employability. For instance, they could offer more training opportunities to support and/or improve academics' occupational skills in teaching, classroom management, and research and publication, as well as more development opportunities to encourage or sponsor academics to participate in local and international seminars, workshops, and conferences. As such, academics with successful training experiences, by showing progress and improvement within their work context, would be motivated to stay with the institution and continuously develop themselves in the supportive working environment, which in turn leads to higher perceived internal mobility and commitment to the institution (Akkermans et al., 2019; Cerdin et al., 2020). Academics who see more development opportunities within an institution are more likely to stay with the institution to safeguard those opportunities for future career development (Akkermans et al., 2019; Mayrhofer et al., 2016; Van Harten et al., 2020).

Although promoting academics perceived internal employability may be beneficial for PHEIs in establishing employee commitment, a systematic career development plan must be formulated to ultimately improve the professional success of academics and performance of the organisation. PHEIs should seek to manage academics' career success by embedding academic staff in the institution, for instance via formal on-the-job and off-the-job training, flexible work arrangements, and a mentoring system (Mayrhofer et al., 2016). Since the key indicators of academics' career success include teaching, research and publication, grant funding, and/or administration, PHEIs should strategise instrumental actions to assist academic staff in acquiring the career competencies to perform their academic roles effectively. Formal training and development on various academics' skills suggested by the Malaysia Qualification Agency (2014), including training in teaching and learning, research and publication, information and communication technologies, and management and leadership skills, are continuously required to increase academics' confidence and efficacy in their work performance and career success (Zacher et al., 2019). Past studies also show that encouraging academics to participate in seminars, workshops, and conferences may lead to more paper presentations and publications, grant awards, research projects, and collaborations among academics (Derosier et al., 2013; Escobar-Alvarez & Myers, 2013), which ultimately increase the intrinsic value of working as an academic.

Also, PHEIs should encourage and support collaborative works between scholars from local and international universities in line with the government's policies and aim to make Malaysia an international education hub in the Asian region. Such networking activities enhance academics' career portfolio and social networks, which in turn increase their visibility and marketability in the industry. Besides, the management of PHEIs should overtly express their recognition and acknowledgement to academics who represent the university and contribute to the university in terms of paper presentation, research publications in high index journals, grants awarded, and collaborative works, as such initiatives can make them feel valued given that rewards and recognition are perceived as important in justifying the meaning of an academic career.

Amid the changes surrounding employment trends and professional requirements, PHEIs are recommended to come up with relevant HRD practices to guide academics in managing their career advancement effectively. In addition to utilising formal training and development practices to build academics' occupational skills, PHEIs can offer support for academics' career planning through more informal mechanisms such as mentoring and coaching programmes. The role of mentoring has been found to be positively related to various success indicators of an academic career, such as the number of publications and research grants obtained, self-efficacy, and interest in pursuing an academic career (Amber, Harvey, & Cahir, 2016; Fleming et al., 2015). Thus, mentoring should be capitalised on as one of the academic development programmes to promote academics' career advancement. Importantly, junior academics who participate in mentoring programmes in cooperation with senior faculty members can improve their career-related skills and their ability to define realistic career goals along with strategies to achieve those goals. Effective mentoring programmes also lead to higher involvement and interaction between mentors and protégés, which positively influences academics' career success as reported by protégés who participated in mentoring programmes for academic professionals (Iversen, Eady, & Wessely, 2014). In addition, PHEIs should adopt more innovative mentoring practices in line with the advancement of communication technologies, such as e-mentoring to complement traditional face-to-face meetings. Some of the latest virtual meeting applications (e.g., Microsoft Team, Google Meet and Zoom) can be utilised as a mentoring technique which allows more flexibility and freedom in terms of knowledge sharing and mobility by moving beyond physical constraints.

Furthermore, PHEIs should endeavour to embrace their role as transformational change leaders who model the mindsets and values expected of the higher education learning community, as per the Malaysia Education Blueprint (2015-2025), to allow academics more flexibility in participating in higher education and sharing expertise. Management should promote flexibility and autonomy among academics to encourage them to take full responsibility of their work while monitoring their progress with meaningful feedback. Since academics' nature of work is different from other occupations, they typically value working conditions that provide flexibility; as such, the management of PHEIs may implement a flexi-hour policy for academics by standardising the total number of hours per week (e.g., 20 hours a week) instead of rigidly requiring them to report to work at the office from 9.00 a.m. to 5.00 p.m. every day. Moreover, management should revisit the term 'teaching workload' by not only confining it to teaching hours but also expanding it to other administrative tasks such as invigilation and supervision of students' final year projects or dissertations. In fact, management is advised to reduce the teaching workload to 12 hours or less per week to provide more flexibility for academics to balance their time at work between teaching and research. This would also alleviate academics' frustration from overloaded teaching-related demands and a lack of time to build their career profile via research and publications.

Also, PHEIs can redesign academics' work by classifying them according to their interest (i.e., teaching or research), and assigning teaching workloads accordingly. Academics who are interested to pursue research and publication should have lower teaching workloads. As the operating procedures and performance indicators for academics in private universities are different from a full research-based university, it is essential for academics' contributions to both teaching and research to be balanced for the success of the academics and the university.

Implications for Government or Policy Makers

The important implications of this study for policy and strategy planning for the higher education industry are highlighted as follows. There is a need to revisit existing policies regulated by the MOHE and MQA pertaining to academic staff and HEIs, in response to the calls for more flexibility and differentiated career pathways for academic practitioners (Ministry of Education Malaysia, 2015). At present, rigid and unstandardised HR policies exist for academic staff in PHEIs, such as rigid working hours from 9.00 a.m. to 6.00 p.m., high teaching loads, and time-consuming administrative works. Academics are not given time to focus on research and publication, falling victim to 'career suicide' due to limited exposure to research, publication, and consultative works reported in their portfolio.

Instead of recommending major changes to existing policies, the researcher suggests new codes of practice to be assimilated or adopted as the thrust to create flexibility and efficiency among academics in PHEIs. The MOHE and MQA should enforce and standardise the implementation of flexi-hours for academics across all PHEIs, with a formal term of execution and guidelines to avoid management from breaching the code of conduct and imposing implicit restrictions on the flexi-hours policy. Besides, the maximum number of teaching hours for academic staff should be stipulated in the academic code of practice and should subsequently be strictly enforced and monitored by MOHE so that these policies are not violated by PHEIs that use their academic resources mainly for teaching purposes. In fact, an ideal teaching load of nine to 12 teaching hours would reduce academics' teaching burden and allow them to balance their time with research, publication, and consultation works, which may help them develop multi-track career pathways. Subsequently, academics can also contract their skills and expertise to private organisations as well as the government, in effect enhancing their portfolio of skills and work experience while adding meaning and/or value to their academic career.

In conjunction with the monitoring and evaluation process for the execution of the above new policies, MQA should realign the assessment metrics of SETARA-2017 concerning the three core functions of HEIs (i.e. teaching, research, and services). Higher weightage should be assigned to research activities, particularly for mature universities and emerging universities, to reflect the importance of research and publication in accreditation and quality assessment for HEIs. For instance, the weightage for research for mature universities should be increased to at least equal or exceed teaching activities (i.e., 25% - 30%). Since mature universities are expected to engage in more research and other consultation services, a higher research proportion should be allocated to their academics. Similarly, weightage on research for emerging universities should be increased to 20% while teaching should be reduced to 35% to get academics from these universities familiar with and ready for more research and consultation works. A balanced proportion of both teaching and research assessment metrics ensures that institutions provide opportunities for their academics to engage in a variety of activities such as teaching, research activities, consultancies, and administrative works, thereby leading to higher quality and motivated academics who are essential for institutional excellence.

As the turnkey to knowledge transformation is education, the knowledge acquired and transferred by HEIs is highly important, especially in tandem with the shift from an industry-intensive to knowledge-intensive economy in Malaysia (Chong, Yuen, & Gan, 2014). However, the Malaysian government has reduced funding for higher education drastically since 2017, at almost a 20% drop from the previous years' budget. These massive cuts for public higher education funding and demands for universities to raise their own funds through commercial services have violated the principle of education as a public good for all (Kamal, 2017). The government should not neglect the investment in higher education and funding of grants for the research and development of HEIs since research outcomes offer

relevant and updated knowledge and expertise that contribute to the design and testing of government policies. Indeed, this is the crux of the wider value of academia to society.

Malaysia's government allocated RM400 million in grants for research and development for HEIs in 2019 (Zahrom, 2018). There are currently 20 public universities and 437 PHEIs with 67,616 academic staff in Malaysia. Many of those academics are interested in research and development activities, yet are still struggling to secure grants due to lack of support from their institution and limited opportunities to be awarded grants from the government. In fact, most grants are awarded to public universities, particularly the five research universities. No doubt, academics in research universities are entitled to receive higher funding for research and development since they play a crucial role in pushing the world ranking of Malaysia's higher education system via high impact research and innovation projects. However, academics from PHEIs should be given equal opportunities to participate and contribute their expertise to policymaking.

Undeniably, the contribution of PHEIs is increasingly important with regards to student enrolment, teaching and learning, research and development, and talent management (Tapsir, 2019). Nevertheless, there remains a considerable gap between public and private universities regarding research funding and academics' participation in national policymaking. It is time to harmonise the regulations and contributions from both public and private HEIs. Academics from PHEIs should be

given equal funding opportunities to undertake policy-focused research, in addition to more avenues to engage with policymakers alongside teaching, research, and other administrative tasks. Besides, more incentives or rewards should be given to PHEIs to enhance their research and development activities through collaboration with agencies, both locally and overseas. This way, academics from PHEIs will gain more international exposure and their contribution of knowledge would not be limited to local policymakers but also to international ones. This ensure that the value of research and the knowledge created have maximum impact. Thus, academia can become a 'high-impact' and attractive career path due to its value and contribution toward society.

To recapitulate, effective career management requires attention and investment from both academics and PHEIs. Academics need to be self-directed, engage in proactive behaviours, and be more flexible and adaptable to manage their employability and career success. In par, PHEIs should enhance academics' employability skills, equip them with up-to-date knowledge and expertise, and rethink the employment relationship from the new psychological contract perspective rather than limiting themselves to the employability paradox. PHEIs should allow and help their academics to develop a portfolio career in creating and sustaining competitive advantage, particularly in today's market environment which expects academics as well as the institutions to be more competitive due to the growing commercialisation of higher education. Furthermore, to sustain quality and equity in the provision of tertiary education, the government should not neglect the importance of investment in higher education, particularly in providing equal opportunities for academics from both public and private HEIs to participate and engage in policymaking so Malaysia can achieve the developing country status in the year 2025.

5.5 Limitations and Suggestions for Future Research

There are several limitations associated with the present study that need to be highlighted. First, this study focused on academics' self-reported perceptions of their career attitude, organisational learning practices, as well as internal and external employability. The researcher used a psychological approach by employing self-perceptions of events as a tool to define specific actions and behaviours (i.e. career success). The responses for all variables were obtained from a single source, i.e., academics in PHEIs who volunteered to participate, via a selfreported questionnaire. Thus, the results of this study might be subject to common source bias and inaccuracies since respondents may tend to answer favourably to portray themselves positively. For these reasons, the researcher conducted a Harman's single-factor test as a post-preventive measure to test if most of the variance was explained by a single factor. The result of the Harman's single-factor analysis indicated no substantial amount of common method variance in this study. Nevertheless, future studies should use others' reports (or perceptions) by soliciting responses from a variety of viewpoints to complement self-reported measures of the variables being studied. For example, the perspectives of supervisors or

managers should be taken into consideration to gain a better understanding of the antecedents of academics' employability and career success, which may provide further insights into the complex issues surrounding academics' perceived employability and career success. This may lead to better decisions from HR practitioners in managing staff employability and career effectively.

Second, the present study was based on a cross-sectional time horizon, where data was collected at one point in time. Since employability and career success are time-bound concepts that reflect an individual's accumulated experience and impacts over time (Arthur & Rousseau, 1996), the respondents might have dissimilar responses towards career outcomes at a different point of time. This is important as past research has found that life and career transitions can cause shifts in a person's perception, attitude, and values toward career outcomes (Bardi & Goodwin, 2011; Hall et al., 2018). For example, a junior academic who worked for an institution for a few months up to a year might be more concerned about internal employability to justify his/her success, whereas through the career life span, an academic who has worked for the institution for three years or more has more experience and exposure in teaching, research, and commercialised activities, and so might prefer external employability or marketability in determining his/her career success. Thus, a cross-sectional study is unable to capture the evolving process of career development and progression over time.

For this reason, this limitation should be addressed in future research by using a longitudinal study that builds the parameter of time with two or more measurement points to reflect the respondents' experiences over time. By exploring the role of time in career outcomes, longitudinal research sheds additional light into the nomological relations among the variables in the model with respect to the sequencing of an event of time. Considering employability development and objective and subjective success as developmental processes whose outcomes are accumulated over time (Judge, Klinger, & Simon, 2010), the importance of the factors affecting employability and career success may only be revealed from a cumulative perspective. Effectively evaluating changes in academics' attitudes and behaviours over time could help institutions develop high impact intervention programmes at different critical time points in academics' career lifespan.

Third, the SCCT-CSM was used as the underpinning theory for the present study, and consistent with the findings of SCCT models, contextual variables (i.e., support) play multifaceted roles in career self-management. Contextual variables are posited to be linked to actions and outcomes (i.e., career success) via several routes – directly, indirectly, and/or as moderators of other relationships. Although moderator hypotheses have appeared in many SCCT models, these hypotheses have rarely been tested in existing studies (Brown & Lents, 2019). Likewise, a moderator was not tested in this study. Brown and Lents (2019) suggested that future research pay greater attention to moderators, since assessing moderator hypotheses in the

SCCT model can benefit researchers in understanding the relationships among related constructs along with their practical and theoretical implications.

As such, future research on model-specific research implications, particularly in employability and career studies, should evaluate the direct as well as moderating impacts of contextual variables. For example, the presence of support such as supervisory support is assumed to be an important motivator that enhances a person's perceived employability and career outcomes. Likewise, a conducive workplace environment enables protean individuals to easily access support and resources for development, increasing the likelihood that their proactive attitude will yield desired outcomes in terms of employability and career success. As such, in the career self-management model, the provision of support and resources (i.e., contextual variables) can be assumed as moderators that enhance people's perceptions and increase the chances of attaining the outcomes they seek (e.g. higher perceived employability and career success). This may provide an impetus for organisational interventions and may be helpful to HR practitioners in developing practical employment strategies to retain protean employees through more internal employability opportunities.

Fourth, the sample of this study was restricted to academics from private tertiary learning institutions in Malaysia, which may not represent the entire population of the higher education sector. Therefore, the generalisation of the research findings is relevant only in the context of PHEIs and may cause bias if
generalised to other educational contexts. Since the research findings may not be able to reflect the general situation of academics in Malaysian higher education, it is recommended that future researchers include respondents from all private and public universities to widen the scope of generalisability. Although private universities are different from public universities in terms of regulations and governance, the contributions and roles of both institutions are equally important in relation to student enrolment, research and development, innovative teaching and learning, and talent management. Importantly, most, if not all, academics from both institutions perform similar roles or tasks (e.g., teaching, research, consultation, and administrative roles) throughout or in a particular phase of their career. A sample from both private and public universities thus would not create any major issues related to sampling bias; instead, it would improve the representativeness of the sample for the population of the higher education sector in Malaysia.

5.6 Conclusion

The present study examined the career management model among a sample of academic staff from PHEIs in Malaysia. This study bridges two main streams of research, employability and career management, by clarifying the roles of personal input (protean career attitude) and contextual variables (organisational learning practices) in producing positive outcomes (perceived employability and career success) for academics in Malaysian PHEIs. In tandem with the growing importance of employability, concurrent with the new employment contract, this study further examined the roles of perceived employability by validating the direct and indirect (mediation) effects of perceived employability. To fill the research gaps, the researcher addressed the distinction between perceived internal employability and perceived external employability by distinguishing and comparing the predictive values of both constructs to measure their varied contributions to academics' career success. In conclusion, the research model was found significant, explaining 56% ($R^2 = 0.563$) of the variance in academics' career success, 40% ($R^2 = 0.407$) of the variance in perceived external employability, and 36% ($R^2 = 0.361$) of the variance in perceived internal employability. Furthermore, eleven out of twelve paths in the research model were significant and, in the direction, proposed by the study. Only one direct path, from protean career attitude to career success, was not significant.

The study findings uncovered the positive impacts of a protean career attitude and organisational learning practices on perceived internal and external employability. Notably, a protean career attitude has a greater impact on perceived external employability while organisational learning practices has a greater impact on perceived internal employability, which complements existing knowledge on the antecedents and outcomes of perceived employability. Moreover, this study builds on previous literature and offers evidence that perceived internal and external employability are the main predictors of career success, rather than personal or contextual indicators. The mediating role of both perceived internal and external employability was also proven, as the results revealed that perceived external employability serves as the main buffer mediating the relationship between both independent variables (protean career attitude and organisational learning practices) and the dependent variable (career success).

Given the fairly high explanatory power of the model, the findings of this study had both theoretical and practical implications. From a theoretical viewpoint, the notable results of this study contribute to the body of knowledge on employability and career management. By exploring the direct and indirect (mediation) effects of perceived employability and distinguishing the predictive value of internal versus external employability, the study findings ascertain the vital role of perceived employability. The findings reveal that academics in Malaysian PHEIs place more emphasis on perceived external employability in building their career path or success in academia. These results improve our theoretical understanding of academics' perception of their employability and career success.

Importantly, the findings clarify the idea underlying the employability paradox, which is a concern among most employers, by showing that organisational learning practices (support and investment) have greater impacts on academics' perceived internal employability, suggesting that organisational support elicits employees' norm of reciprocity, resulting in higher perceived internal employability. Though internal employability enhancement has less predictive value towards academics' career success, PHEIs can retain their academics and remove them from the external labour market by focusing on strategies that bind employees to the organisation, such as flexible work arrangements, mentoring systems, career portfolio development utilising their skills, as well as consultative services and collaborative research with other private corporations and government agencies.

From a practical viewpoint, this study contributes to academics, HEIs, and policymakers in managing employability and career success in academia. Academics should proactively manage their career by being more flexible and adaptable, such as by being willing to take on new challenges other than teaching and research, rather than being conservative and resistant to change. PHEIs should also offer more opportunities for development, such as encouraging academicians to participate in seminars, workshops, and conferences, while redesigning academics' job to allow them more flexibility and autonomy in navigating their career within or beyond organisational boundaries. Moreover, the Malaysian government via the MOHE should revisit existing policies pertaining to academics in higher education, by standardising and formally enforcing regulations with regards to flexi-hours and teaching loads. Also, a greater budget should be allocated to research and development, and more opportunities should be given to academics from PHEIs to participate in government grants and contribute to national policymaking to make the academic career an attractive and meaning career path.

As a conclusion, both from theoretical and practical standpoints, this study uncovers the relevant factors that contribute to the perceived employability and ultimately, the career success of academic staff from PHEIs in Malaysia. These research findings are particularly meaningful for PHEIs in formulating and implementing effective HRD strategies not only to manage their academic staff effectively but also to create a sustainable competitive advantage for institutions to cope with intense competition due to globalisation and the commercialisation of the higher education industry in Malaysia.

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APPENDICES



Appendix 1: Social Cognitive Career Theory – Career Self-Management Model (SCCT-CSM)

Source: Lent & Brown (2013).

Appendix 2: Career Resources Model



Source: Hirschi (2012).

Appendix 3: Research Onion Framework



Source: Saunders et al. (2012).

Appendix 4: HEIs Awarded with SETARA-2017, 4 Stars & Above

6-STAR: OUTSTANDING			
Name of Institution	Name of Institution		
International Medical University	Universiti Putra Malaysia		
Monash University Malaysia	Universiti Sains Malaysia		
Universiti Kebangsaan Malaysia	Universiti Teknologi Malaysia		
Universiti Malaya	Universiti Teknologi Petronas		

5-STAR: EX	KCELLENT				
Name of Institution	XCELLENTName of InstitutionManagement and Science UniversitySunway UniversitySunway UniversityUCSI UniversityTaylor's UniversityUniversiti Malaysia PahangUniversiti Malaysia TerengganuUniversiti Pertahanan Nasional MalaysiaUniversiti Tunku Abdul RahmanKolej Universiti Sains Perubatan CyberjayaLincoln University College				
Curtin University Sarawak Malaysia	Management and Science University				
Swinburne University of Technology Sarawak Campus	Sunway University				
The University of Nottingham Malaysia Campus	UCSI University Taylor's University				
Universiti Islam Antarabangsa Malaysia	Taylor's University				
Universiti Malaysia Perlis	Universiti Malaysia Pahang				
Universiti Malaysia Sarawak	Universiti Malaysia Terengganu				
Universiti Teknologi Mara	Universiti Pertahanan Nasional Malaysia				
Universiti Tenaga Nasional	Universiti Tunku Abdul Rahman				
Universiti Utara Malaysia	Kolej Universiti Sains Perubatan Cyberjaya				
Asia Pacific University of Technology & Innovation	Lincoln University College				
International Centre of Education in Islamic Finance					

4-STAR: VI	ERY GOOD				
Name of Institution	Name of Institution				
Aimst University	SEGi University				
Universiti Malaysia Sabah	HELP University				
Universiti Multimedia	Universiti Infrastruktur Kuala Lumpur				
Universiti Pendidikan Sultan Idris	Name of InstitutionSEGi UniversityHELP UniversityUniversiti Infrastruktur Kuala LumpurUniversiti Kuala LumpurUniversiti Malaysia KelantanUniversiti NilaiUniversiti Sultan Zainal AbidinUniversiti Tun Abdul RazakKDU Universiti Hospitaliti BerjayaKolej Universiti InsaniahKolej Universiti Islam Antarabangsa SelangorKolei Universiti Tati				
Universiti Sains Islam Malaysia	VERY GOODName of InstitutionSEGi UniversityHELP UniversityUniversiti Infrastruktur Kuala LumpurUniversiti Kuala LumpurUniversiti Malaysia KelantanUniversiti NilaiUniversiti Sultan Zainal AbidinUniversiti Tun Abdul RazakKDU Universiti Hospitaliti BerjayaKolej Universiti InsaniahKolej Universiti Islam Antarabangsa SelangorNKolej Universiti TatiEKolej Universiti Tati				
Universiti Teknikal Malaysia Melaka	Universiti Nilai				
Universiti Tun Hussein Onn Malaysia	Universiti Kuala LumpurUniversiti Malaysia KelantanUniversiti NilaiUniversiti Sultan Zainal AbidinUniversiti Tun Abdul RazakKDU University CollegeKolej Universiti Hospitaliti Berjaya				
Al-Madinah International University	Universiti Tun Abdul Razak				
Asia E University	KDU University College				
City University	Kolej Universiti Hospitaliti Berjaya				
Inti University	Kolej Universiti Insaniah				
Mahsa University	Kolej Universiti Islam Antarabangsa Selangor				
Malaysian Institute for Supply Chain Innovation	Kolej Universiti Tati				
Newcastle University Medicine Malaysia	Kolej Universiti Teknologi Antarabangsa Twintech				
Perdana University					

Source: Ministry of Education Malaysia (2017).

Appendix 5: GPower Analysis



Appendix 6: Expert Validation Report

CANDIDATE BACKGROUND INFORMATION

Candidate Name	Tee Poh Kiong
Programme	Doctor of Philosophy in Management
Thesis Title	A study on the relationship between individual and organisation career management practices toward academics' career success
Awarding Institution	University Tunku Abdul Rahman

EXPERT BACKGROUND INFORMATION

Expert Name (in Full)	
Title	
Position	
Institution	
Date	
Signature and	
Common Seal (If	
available)	

Dear Respected Dato' / Professor / Associate Professor / Senior Lecturers / Lecturers,

I am Tee Poh Kiong, currently pursuing my PhD in Universiti Tunku Abdul Rahman (UTAR), Malaysia.

The primary objective of the current research is to study the relationship between individual and organisation career management practices toward academics' career success in Malaysia private higher learning institutions.

I would like to seek your "**Expert Opinion**" on my survey questionnaire. Your academic opinions will be of immense use to enhance this research questionnaire. Please do not fill up the questionnaire but kindly provide comments and suggestion as per the table below:

No.	Questions	Your valuable comments and suggestions
1.	Do the listed questions in the questionnaire is clear and easy to understand?	
2.	Did you find any mistakes in the questionnaire?	
3.	Are there any grammatical and spelling error?	
4.	Is the questionnaire content exhaustive to the objective of the study?	

No.	Questions	Your valuable comments and suggestions
5.	Are the scale measurements for the constructs suitable? (This research uses a 6-point Likert scale for the independent variable, mediating variables and dependent variable)	
6.	Did any important information, the researcher missed out in this questionnaire?	
7.	Is there any item to be deleted or added?	
8.	Can you please give some relevant technical questions might be added in the questionnaire?	

Overall remarks/comment:

Thank you and highly appreciate your time and valuable comments.

PhD Candidate: Tee Poh Kiong Faculty of Accountancy and Management Universiti Tunku Abdul Rahman (UTAR) E-mail: seantee@live.com Tel: +6012-3242122

Appendix 7: Sample of Questionnaire

SURVEY QUESTIONNAIRE

Dear Respected Respondents:

You are invited to participate in a research conducted by (Mr) Tee Poh Kiong, PhD candidate of Universiti Tunku Abdul Rahman (UTAR), under the supervision of Dr Lau Teck Chai in the Faculty of Accountancy and Management. I am conducting a study on *"A Study on the Relationship between Individual and Organisation Career Management Practices toward Academics' Career Success"* as part of my PhD research. The objective of this research is to obtain your valuable inputs on how you perceive the influence of both individual and organisation factor toward your career success in the private higher education institutions in Malaysia.

This questionnaire consists of six sections and the amount of time that you will spend in connection with this study is approximately 15-20 minutes. Your participation in this study is voluntary, and if you agree to participate in this study, you will be asked to answer **ALL** the questions in this questionnaire. Under the Personal Data Protection Act (PDPA) 2010, we assure you that all information collected will be kept confidential and the information will be used merely for academic purposes. If you have any questions or concerns about completing the questionnaire, please feel free to contact (Mr) Tee Poh Kiong at seantee@live.com. You may also contact the Faculty of Accountancy and Management of UTAR, Sungai Long Campus, at 603-9086 0288 for further verification for the above research.

Thank you for your willingness to spare some of your precious time answering this questionnaire. We highly appreciate it.

Section A: General Information

The following questions are to obtain your personal information. Please **tick** ($\sqrt{}$) the item that best describes you.

A	a van a Malavaian agadamia staff?		
Ar	e you a malaysian academic starr:		
	Yes		No*
*Y	ou may stop the survey if you tick "No".		
1. '	What is your gender?		
	Male		Female
2. `	What is your age?		
	Less than 30		30-40
	41-50		51 or older
3. '	What is your highest level of education	n?	
	Bachelor (or Professional Degree)		
	Master's Degree		
	Doctorate Degree		
4.]	How long have you been working with	this	organization?
	Fewer than 2 years		3-5 years
	6-9 years		10 years and above
5. ^v	What is your position in this organisat	ion?	
	Assistant Lecturer / Lecturer		Associate Professor
	Senior Lecturer (or Assistant Professor) 327) 🗆	Professor / Distinguished Professor

Section B: Questions to obtain the respondent's protean career attitude.

Please indicate the extent to which the following statements are true for you, using the following response scale. Please "circle" or place an "X" over the appropriate response.

1	2	3	4	5
To little or no	To a limited	To some	To a considerable	To a great
extent	extent	extent	extent	extent

	Questions / Items	F	Evalu	ation	scal	le
1	When development opportunities have not been offered by my organisation, I've sought them out on my own.	1	2	3	4	5
2	I am responsible for my success or failure in my career.	1	2	3	4	5
3	Overall, I have a very independent, self-directed career.	1	2	3	4	5
4	Freedom to choose my own career path is one of my most important values.	1	2	3	4	5
5	I am in charge of my own career.	1	2	3	4	5
6	Ultimately, I depend upon myself to move my career forward.	1	2	3	4	5
7	Where my career is concerned, I am very much 'my own person'.	1	2	3	4	5
8	In the past, I have relied more on myself than others to find a new job.	1	2	3	4	5
9	I navigate my own career, based on my personal priorities, as opposed to my employer's priorities.	1	2	3	4	5
10	It doesn't matter much to me how other people evaluate the choices I make in my career.	1	2	3	4	5
11	What's most important to me is how I feel about my career success, not how other people feel about it.	1	2	3	4	5
12	I'll follow my own conscience if my organisation asks me to do something that goes against my values.	1	2	3	4	5
13	What I think about what is right in my career is more important to me than what my organisation thinks.	1	2	3	4	5
14	In the past, I have sided with my own values when the organisation has asked me to do something I don't agree with.	1	2	3	4	5

Section C: Questions to obtain the respondent's perception of organisational learning practices.

Please circle to what extent do you agree or disagree with the following statements based on the rating scale below. Please "circle" or place an "X" over the appropriate response.

1	2	3	4	5
Strongly disagree	Disagree	Neutral	Agree	Strongly agree

	Questions / Items	F	Evaluation Scale				
1	In my organisation, people help each other to learn.	1	2	3	4	5	
2	In my organisation, people are given time to support learning.	1	2	3	4	5	
3	In my organisation, people are rewarded for learning.	1	2	3	4	5	
4	In my organisation, people give open and honest feedback to each other.	1	2	3	4	5	
5	In my organisation, when people state their view, they also ask others' opinion.	1	2	3	4	5	
6	In my organisation, people spend time building trust with each other.	1	2	3	4	5	
7	In my organisation, teams have the freedom to adapt their goal as needed.	1	2	3	4	5	
8	In my organisation, teams revise their thinking as a result of group discussion.	1	2	3	4	5	
9	In my organisation, teams are confident that the organisation will act on their recommendation.	1	2	3	4	5	
10	My organisation creates systems to measure gaps between current and expected performance.	1	2	3	4	5	
11	My organisation makes its lessons learned available to all employees' performance.	1	2	3	4	5	
12	My organisation measures the results of the time and resources spent in training	1	2	3	4	5	
13	My organisation recognises people for taking initiative.	1	2	3	4	5	
14	My organisation gives people control over the resources they need to accomplish their work.	1	2	3	4	5	

15	My organisation supports employees who take calculated risks.	1	2	3	4	5
16	My organisation encourages people to think from a global perspective.	1	2	3	4	5
17	My organisation works together with the outside community to meet mutual needs.	1	2	3	4	5
18	My organisation encourages people to get answers from across the organisation when solving the problem.	1	2	3	4	5
19	In my organisation, leader mentors and coaches those they lead.	1	2	3	4	5
20	In my organisation, leaders continually look for an opportunity to learn.	1	2	3	4	5
21	In my organisation, leaders ensure that the organisation's actions are consistent with their values.	1	2	3	4	5
22	Overall, I find that my organisation did continuously manage their learning and development practices	1	2	3	4	5

Section D: Questions to obtain the respondent's perception of internal employability.

Please circle to what extent do you agree or disagree with the following statements based on the rating scale below. Please "circle" or place an "X" over the appropriate response.

1	2	3	4	5
Strongly disagree	Disagree	Neutral	Agree	Strongly agree

	Questions / Items	F	Evalu	ation	Scal	e
1	Even if there was downsizing in this organisation, I am confident that I would be retained.	1	2	3	4	5
2	My personal networks in this organisation help me in my career.	1	2	3	4	5
3	I am aware of the opportunities arising in this organisation even if they are different from what I do now.	1	2	3	4	5
4	The skills I have gained in my present job are transferable to other occupations outside this organisation.	1	2	3	4	5

Section E: Questions to obtain the respondent's perception of external employability.

Please circle to what extent do you agree or disagree with the following statements based on the rating scale below. Please "circle" or place an "X" over the appropriate response.

1	2	3	4	5
Strongly disagree	Disagree	Neutral	Agree	Strongly agree

	Questions / Items	Evaluation Scale					
1	I could easily retrain to make myself more employable elsewhere.	1	2	3	4	5	
2	I have a good knowledge of opportunities for me outside of this organisation even if they are quite different from what I do now.	1	2	3	4	5	
3	Among the people who do the same job as me, I am well respected in this organisation.	1	2	3	4	5	
4	If I needed to, I could easily get another job like mine in a similar organisation.	1	2	3	4	5	
5	I could easily get a similar job to mine in almost any organisation.	1	2	3	4	5	
6	Anyone with my level of skills and knowledge, and similar job and organisational experience, will be highly sought after by employers.	1	2	3	4	5	
7	I could get any job, anywhere, so long as my skills and experience were reasonably relevant.	1	2	3	4	5	

Section F: Questions to obtain the respondent's perception of career success

Please circle to what extent do you agree or disagree with the following statements based on the rating scale below. Please "circle" or place an "X" over the appropriate response.

1	2	3	4	5
Strongly	Disagree	Neutral	Agree	Strongly agree
disagree				

	Questions / Items	E	Evalu	ation	Scal	le
1	I am satisfied with the number of peer-reviewed journals or indexed journal published yearly.	1	2	3	4	5
2	I have been recognised as a good performer in the organisation that I worked for.	1	2	3	4	5
3	I believe the work I have done has contributed to society.	1	2	3	4	5
4	I am earning as much as I think my work is worth.	1	2	3	4	5
5	I have continuously improved by developing my skillset in my work.	1	2	3	4	5
6	I am satisfied with the progress I have made toward meeting my goals for advancement.	1	2	3	4	5
7	I am satisfied with the success I have achieved in my career.	1	2	3	4	5
8	I have been able to pursue work that meets my personal needs and preferences.	1	2	3	4	5
9	I am enthusiastic about my career.	1	2	3	4	5

*** END of Questionnaire. Thanks for Participating ***

Appendix 8: Comparison of Mediating Effects - Spreadsheet Illustration

Sample of Calculation:

Ori	iginal (O)	e' 0,006	a1	a2	b1	b2	a1xb1	+2-1-2		100.1	1000 C 1000 C 1000
Ori Me	iginal (O)	0,006	0.007					91×01	(a1×b1)+(a2×b2)		M1-M2
Me	At 11		0,827	0,637	0,259	0,509	0,214	0,324	0,538	Original (O)	-0,11
	ean (M)	0,008	0,826	0,640	0,251	0,518	0,207	0,332	0,540	Mean (M)	-0,12
513	is (O - M)	-0,002	0,001	-0,003	0,008	-0,009	0,007	-0,008	-0,001	Bias (O - M)	0,01
Per	rcentile LOWER (5%)	-0,189	0,757	0,509	0,022	0,365	0,018	0,217	0,373	Percentile LOWER (2.5%)	-0,45
i Per	rcentile UPPER (95%)	0,194	0,884	0,748	0,474	0,670	0,396	0,459	0,715	Percentile UPPER (97.5%)	0,17
BC	P. LOWER (5%) + Bias	-0,191	0,758	0,506	0,030	0,356	0,025	0,208	0,372	BC: P. LOWER (2.5%) + Blas	-0,44
BC	P. UPPER (95%) + Blas	0,192	0,885	0,745	0,482	0,661	0,403	0,451	0,714	BC: P. UPPER (97.5%) + Bias	0,18
3		c'	a1	a2	b1	b2	a1×b1	a2×b2	(a1×b1)+(a2×b2)		M1-M2
0 Sar	mple 0	-0,12	0,834	0,704	0,38	0,527	0,317	0,371	0,688		-0,05
1 Sar	mple 1	-0,136	0,885	0,552	0,348	0,589	0,308	0,325	0,633		-0,01
2 Sar	mple 2	-0,044	0,83	0,584	0,317	0,503	0,263	0,294	0,557		-0,03
3 Sar	mple 3	-0,065	0,823	0,605	0,461	0,349	0,379	0,211	0,591		0,16
4 Sar	mple 4	0,037	0,863	0,71	0,173	0,559	0,149	0,397	0,546		-0,24

Actual Results:

٨	D	<u> </u>	D	-	r	6				V			N
A	D	U	U	E	r	6	п		J	ĸ	L	IVI	IN
PCA - CS								OLP-CS					
Original	(0.189-0.0	44)			0.145			Original	(0.174-0.0	93)			0.081
Mean					0.141			Mean					0.087
Bias (O-M	I)				0.004			Bias (O-M)					-0.006
Percentil	e Lower (59	%)			0.089			Percentil	e Lower (5%	6)			0.017
Percentile	e Upper (95	5%)			0.194			Percentil	e Upper (95	6%)			0.157
BC P.Lowe	er + Bias				0.093	93 BC P.Lower + Bias						0.011	
BC P.Upper + Bias				0.198			BC P.Upper + Bias 0					0.151	
	PCA -> PE	E -> CS	PCA -> PI	E -> C S	M1-M2				OLP -> PE	E -> CS	OLP -> PI	E -> C S	M1-M2
	0.162]	0.033		0.129				0.199		0.053		0.147
	0.114		0.036		0.078				0.147		0.090		0.057
	0.209		0.042		0.167				0.197		0.129		0.068
	0.194		0.030		0.164				0.206		0.090		0.116
	0.168		0.045		0.124				0.193		0.088		0.105
	0.147		0.039		0.108				0.121		0.107		0.014
	0.141		0.013		0.128				0.115		0.029		0.086
	0.156		0.039		0.117				0.213		0.088		0.125
	0.258		0.062		0 196				0.221		0 123		0 000
()	Sheet1	+											
		_											
													1

Appendix 9: UTAR's Ethical Approval for Research Project



Re: U/SERC/122/2018

15 November 2018

Dr Lau Teck Chai Department of International Business Faculty of Accountancy and Management Universiti Tunku Abdul Rahman Jalan Sungai Long Bandar Sungai Long 43000 Kajang, Selangor

Dear Dr Lau,

Ethical Approval For Research Project/Protocol

We refer to your application dated 23 October 2018 for ethical approval for your research project (PhD student's project) and are pleased to inform you that your application has been approved under <u>expedited</u> <u>review</u>.

The details of your research project are as follows:

Research Title	A Study on the Relationship between Individual Protean Career							
	Attitude and Organization Learning Practices Toward Career							
	Success of Academic Staffs in Private Higher Education							
	Institutions							
Investigator(s)	Dr Lau Teck Chai							
-	Tee Poh Kiong (UTAR Postgraduate Student)							
Research Area	Social Sciences							
Research Location	Malaysia							
No of Participants	300 participants							
Research Costs	Self-funded							
Approval Validity	15 November 2018 - 14 November 2019							

The conduct of this research is subject to the following:

- (1) The participants' informed consent be obtained prior to the commencement of the research;
- (2) Confidentiality of participants' personal data must be maintained; and
- (3) Compliance with procedures set out in related policies of UTAR such as the UTAR Research Ethics and Code of Conduct, Code of Practice for Research Involving Humans and other related policies/guidelines.

Kampar Campus : Jalan Universiti, Bandar Barat, 31900 Kampar, Perak Darul Ridruan, Malaysia Tel: (605) 468 8888 Fax: (605) 466 1313 Sungai Long Campus : Jalan Sungai Long, Bandar Sungai Long, Cheras, 43000 Kajang, Selangor Darul Ehsan, Malaysia Tel: (603) 9086 0288 Fax: (603) 9019 8868 Webzite: www.utar.edn.my



Should you collect personal data of participants in your study, please have the participants sign the attached Personal Data Protection Statement for your records.

The University wishes you all the best in your research.

Thank you.

Yours sincerely,

Professor Ts Dr Faidz bin Abd Rahman Chairman UTAR Scientific and Ethical Review Committee

c.c Dean, Faculty of Accountancy and Management Director, Institute of Postgraduate Studies and Research

Kampar Campus : Jalan Universiti, Bandar Barat, 31900 Kampar, Perak Darul Ridman, Malaysia Tel: (605) 468 8888 Fax: (605) 466 1313 Sungai Long Campus : Jalan Sungai Long, Bandar Sungai Long, Cheras, 43000 Kajang, Selangor Darul Ehsan, Malaysia Tel: (603) 9086 028 Fax: (603) 9019 8868 Website: www.utar.edm.my



Appendix 10: Results of Normality Test

Tests of Normality										
	Kolmog	orov-Smiri	nov ^a	Shapiro-Wilk						
	Statistic	df	Sig.	Statistic	df	Sig.				
Protean career attitude 1	.327	288	.000	.767	288	.000				
Protean career attitude 2	.347	288	.000	.767	288	.000				
Protean career attitude 3	.309	288	.000	.808	288	.000				
Protean career attitude 4	.305	288	.000	.812	288	.000				
Protean career attitude 5	.261	288	.000	.823	288	.000				
Protean career attitude 6	.299	288	.000	.808	288	.000				
Protean career attitude 7	.304	288	.000	.803	288	.000				
Protean career attitude 8	.308	288	.000	.803	288	.000				
Protean career attitude 9	.266	288	.000	.827	288	.000				
Protean career attitude 10	.340	288	.000	.784	288	.000				
Protean career attitude 11	.312	288	.000	.807	288	.000				
Protean career attitude 12	.309	288	.000	.807	288	.000				
Protean career attitude 13	.287	288	.000	.821	288	.000				
Protean career attitude 14	.304	288	.000	.823	288	.000				

a. Lilliefors Significance Correction

	Tests	s of Norm	ality			
	Kolmog	orov-Smir	nov ^a	SI	napiro-Wilk	
	Statistic	df	Sig.	Statistic	df	Sig.
Organizational learning practices 1	.342	288	.000	.768	288	.000
Organizational learning practices 2	.321	288	.000	.812	288	.000
Organizational learning practices 3	.291	288	.000	.840	288	.000
Organizational learning practices 4	.284	288	.000	.799	288	.000
Organizational learning practices 5	.277	288	.000	.809	288	.000
Organizational learning practices 6	.280	288	.000	.808	288	.000
Organizational learning practices 7	.270	288	.000	.840	288	.000
Organizational learning practices 8	.308	288	.000	.811	288	.000
Organizational learning practices 9	.266	288	.000	.833	288	.000
Organizational learning practices 10	.285	288	.000	.813	288	.000
Organizational learning practices 11	.345	288	.000	.792	288	.000
Organizational learning practices 12	.302	288	.000	.821	288	.000
Organizational learning practices 13	.341	288	.000	.792	288	.000
Organizational learning practices 14	.328	288	.000	.799	288	.000
Organizational learning practices 15	.391	288	.000	.714	288	.000
Organizational learning practices 16	.329	288	.000	.763	288	.000
Organizational learning practices 17	.363	288	.000	.745	288	.000

Organizational learning practices 18	.315	288	.000	.798	288	.000
Organizational learning practices 19	.304	288	.000	.806	288	.000
Organizational learning practices 20 Organizational learning practices 21	.335	288	.000	.794	288	.000
	.297	288	.000	.784	288	.000
Organizational learning practices 22*	.376	288	.000	.731	288	.000

a. Lilliefors Significance Correction

Tests of Normality								
	Kolmogo	orov-Smirno	ov ^a	SI				
	Statistic	df	Sig.	Statistic	df	Sig.		
Perceived internal employability 1 Perceived internal employability 2 Perceived internal employability 3	.301	288	.000	.768	288	.000		
	.287	288	.000	.834	288	.000		
	.299	288	.000	.783	288	.000		
Perceived internal employability 4	.304	288	.000	.801	288	.000		

a. Lilliefors Significance Correction

Tests of Normality								
	Kolmogo	prov-Smirno)V ^a	Shapiro-Wilk				
	Statistic	df	Sig.	Statistic	df	Sig.		
Perceived external employability 1 Perceived external employability 2 Perceived external employability 3 Perceived external employability 4 Perceived external employability 5 Perceived external employability 6	.286	288	.000	.806	288	.000		
	.312	288	.000	.800	288	.000		
	.309	288	.000	.804	288	.000		
	.295	288	.000	.824	288	.000		
	.296	288	.000	.823	288	.000		
	.310	288	.000	.806	288	.000		
Perceived external employability 7	.352	288	.000	.784	288	.000		

a. Lilliefors Significance Correction

Tests of Normality							
	Kolmogo	orov-Smirnc	JV ^a	SI	Shapiro-Wilk		
	Statistic	df	Sig.	Statistic	df	Sig.	
Career success 1	.311	288	.000	.772	288	.000	
Career success 2	.309	288	.000	.786	288	.000	
Career success 3	.263	288	.000	.814	288	.000	
Career success 4	.321	288	.000	.815	288	.000	
Career success 5	.315	288	.000	.789	288	.000	
Career success 6	.324	288	.000	.799	288	.000	
Career success 8	.322	288	.000	.795	288	.000	
Career success 9	.314	288	.000	.785	288	.000	

a. Lilliefors Significance Correction

Appendix 11: Results of Harman's Single-Factor Test

Factor	Initial Eigenvalues		Extraction Sums of Squared Loadings			
	Total	% of Variance	Cumulative %	Total	% of Variance	Cumulative %
1	14.377	25.673	25.673	13.638	24.353	24.353
2	5.671	10.126	35.799			
3	3.792	6.771	42.570			
4	2.107	3.763	46.333			
5	1.572	2.807	49.139			
6	1.298	2.318	51.457			
7	1.269	2.267	53.723			
8	1.216	2.171	55.895			
9	1.134	2.025	57.920			
10	1.050	1.875	59.794			
11	1.032	1.842	61.636			
12	.954	1.704	63.341			
13	.933	1.665	65.006			
14	.877	1.565	66.572			
15	.834	1.488	68.060			
16	.824	1.471	69.531			
17	.765	1.367	70.898			
18	.744	1.328	72.226			
19	.706	1.260	73.486			
20	.699	1.249	74.735			
21	.691	1.234	75.969			
22	.666	1.189	77.158			
23	.638	1.139	78.297			
24	.611	1.090	79.387			
25	.594	1.062	80.449			
26	.586	1.047	81.496			
27	.532	.950	82.446			
28	.525	.937	83.383			
29	.511	.912	84.295			
30	.508	.906	85.202			
31	.473	.844	86.046			
32	.462	.825	86.871			
33	.449	.801	87.673			
34	.443	.791	88.463			
35	.427	.762	89.225			
36	.404	.722	89.947			
37	.401	.716	90.663			
38	.381	.680	91.344			
39	.368	.658	92.001			
40	.364	.651	92.652			

Total Variance Explained

-					
41	.349	.624	93.275		
42	.342	.611	93.887		
43	.329	.587	94.474		
44	.312	.556	95.030		
45	.293	.524	95.554		
46	.280	.501	96.055		
47	.273	.487	96.542		
48	.266	.475	97.017		
49	.259	.463	97.481		
50	.229	.409	97.890		
51	.220	.393	98.283		
52	.213	.380	98.663		
53	.205	.366	99.029		
54	.195	.348	99.378		
55	.180	.322	99.699		
56	.168	.301	100.000		

Extraction Method: Principal Axis Factoring.

Indicators	Loading	Indicators	Loading
Protean Career Attitude		Perceived External	
PCA1	0.664	Employability	
PCA2	0.690	PEE1	0.778
PCA3	0.713	PEE2	0.693
PCA4	0.691	PEE3	0.686
PCA5	0.749	PEE4	0.786
PCA6	0.692	PEE5	0.753
PCA7	0.713	PEE6	0.720
PCA8	0.693	PEE7	0.653
PCA9	0.723		
PCA10	0.657		
PCA11	0.659		
PCA12	0.707		
PCA13	0.740		
PCA14	0.763		
Perceived Internal		Career Success	
Employability		CS1	0.622
PIE1	0.747	CS2	0.712
PIE2	0.796	CS3	0.723
PIE3	0.726	CS4	0.663
PIE4	0.757	CS5	0.711
		CS6	0.668
		CS7	0.660
		CS8	0.750
		CS9	0.724

Appendix 12: Reflective Constructs' Indicators Outer Loading

Indicators with lowest loading value from each construct



Appendix 13: Structural Model's Predictive Relevance (Q²)

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PUBLICATION

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- Tee, P.K., & Chan, Y.F. (2016). Exploring factors towards career success in Malaysia, *International Business Management*, 10(17), 3936-3943.
- Tee, P.K., Cham, T.H., Low, M.P., & Lau, T.C. (2021). The role of perceived employability in the relationship between protean career attitude and career success, *Australian Journal of Career Development*. (Accepted for publication)
- Tee, P.K., Cham, T.H., Low, M.P., & Lau, T.C. (2021). The roles of organisation career management: Comparing the academic staffs' perception of internal and external employability in determining success in academia, *Malaysian Online Journal of Educational Management*. (Under review)

Conference Presentations:

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