
A thesis submitted for the degree of Doctor of Philosophy

by

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ABSTRACT

At present, high-performance work systems (HPWSs) are widely believed to be a potential source of sustainable competitive advantage for organisations. However, although there is sufficient evidence to indicate the positive relationship between the HPWS and organisational performance, it remains unclear precisely how such a system affects organisational performance. Accordingly, there have been calls in the literature to access the level of individual employees in order to examine this relationship through their perspectives and perceptions regarding HPWSs because, at the end of the day, their experiences and interactions with such systems are what determine their subsequent attitudes and behaviours, which ultimately affect customer satisfaction and enhance the service climate in the organisation or vice versa. The current study, which is funded by the Shura Council*, aims to fill this gap by empirically examining the effects of the HPWS, employee outcomes (measured in terms of job satisfaction, commitment, trust, motivation and intention to remain) and service climate on customer satisfaction in the Omani public sector. This study contributes to our understanding of the ‘black box’: the mechanism by which perceptions of an HPWS affects customer satisfaction. The study examines the direct effects of employee outcomes and service climate on customer satisfaction as well their mediating effects on the relationship between the HPWS and customer satisfaction. Furthermore, this study explores the moderating effect of agencification on the HPWS-customer satisfaction link. In so doing, it not only provides insight into how the HPWS affects customer satisfaction through its direct and indirect impacts on employee attitudes and behaviours as well as service climate but also contributes to the literature of the two fields of strategic human resources management and new public management (NPM).

Using a sample of 521 professionals in 15 government entities in the public sector in Oman, a partial mediation model was identified and tested using structural equation modelling. The study results indicate that an HPWS has significant positive relationships with employee outcomes and service climate. The findings also reveal that both employee outcomes and service climate partially mediate the relationship between the HPWS and customer satisfaction. Furthermore, the employee outcomes were found to have both direct and indirect effects on customer satisfaction via the service climate. Therefore, the study findings suggest that public-sector officials should seek to adopt and invest in HPWSs to enhance positive employee attitudes and behaviours and to cultivate a favourable service climate that will ultimately enhance the level of customer satisfaction. On the other hand, the results of this research did not support NPM’s claim that agencification is an effective way to render public bureaucratic institutions more effective in achieving customer satisfaction. The study, therefore, raises concerns about the persistence of many international organisations, such as the World Bank and IMF, in calling on governments to implement this trend, particularly in developing countries.

* House of Representatives in Oman.
DEDICATION

To my grandmother, my parents, my wife and my kids.
ACKNOWLEDGEMENTS

At the end of the long and beautiful doctoral journey, filled with many useful lessons and experiences, praise is to Allah, Lord of the worlds, for His guidance and blessings.

I am also grateful to my supervisors, who provided help, guidance and support. First of all, I express my sincere gratitude to Dr Goudarz Azar and Dr Satwinder Singh for their patience and constant encouragement. Your advice and recommendations helped improve the quality of my thesis and helped me develop as a researcher. I would also like to thank the Brunel Graduate School, Dr Inmaculada Andres and Dr Tina Ramkalawan for their support, advice and practical workshops that have had a significant impact on the development of my research skills and knowledge.

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In conclusion, I would like to thank my beloved wife and children for their patience, understanding and tolerance of the requirements of this exciting research journey. Their infinite love and support played a key role in bringing it to a successful conclusion.

A very special thank you goes out to all of you!
AUTHOR’S DECLARATION

I, Adel Fadhil, declare that the ideas, research work, analyses, findings and conclusions reported in my PhD thesis are entirely my own efforts, except where otherwise acknowledged. I also certify that this thesis contains no material that has been submitted previously, in whole or in part, for the award of any other academic degree or diploma. Except where otherwise indicated, this thesis is my own work.
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<table>
<thead>
<tr>
<th>Abbreviation</th>
<th>Description</th>
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<tbody>
<tr>
<td>AMO</td>
<td>Ability–Motivation–Opportunity</td>
</tr>
<tr>
<td>AVE</td>
<td>Average Variance Extracted</td>
</tr>
<tr>
<td>CMB</td>
<td>Common Method Bias</td>
</tr>
<tr>
<td>GDP</td>
<td>Gross Domestic Product</td>
</tr>
<tr>
<td>GoF</td>
<td>Goodness-Of-Fit Index</td>
</tr>
<tr>
<td>HCM</td>
<td>Hierarchical Component Model</td>
</tr>
<tr>
<td>HOC</td>
<td>Higher-Order Construct</td>
</tr>
<tr>
<td>HPWS</td>
<td>High-Performance Work Systems</td>
</tr>
<tr>
<td>HR</td>
<td>Human Resource</td>
</tr>
<tr>
<td>HRM</td>
<td>Human Resource Management</td>
</tr>
<tr>
<td>HTMT</td>
<td>The Heterotrait-Monotrait Ratio of Correlations</td>
</tr>
<tr>
<td>IMF</td>
<td>International Monetary Fund</td>
</tr>
<tr>
<td>LOC</td>
<td>Lower-Order Construct</td>
</tr>
<tr>
<td>MICOM</td>
<td>Measurement Invariance of Composite Model</td>
</tr>
<tr>
<td>NPM</td>
<td>New Public Management</td>
</tr>
<tr>
<td>OECD</td>
<td>The Organisation for Economic Co-Operation And Development</td>
</tr>
<tr>
<td>PLS-SEM</td>
<td>Partial Least Squares Structural Equation Modelling</td>
</tr>
<tr>
<td>RBV</td>
<td>The Resource-Based View</td>
</tr>
<tr>
<td>RMSEA</td>
<td>Root Mean Square Error of Approximation</td>
</tr>
<tr>
<td>SD</td>
<td>Standard Deviation</td>
</tr>
<tr>
<td>SEM</td>
<td>Structural Equation Modelling</td>
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<tr>
<td>SHRM</td>
<td>Strategic Human Resource Management</td>
</tr>
<tr>
<td>SPSS</td>
<td>Statistical Package for Social Sciences</td>
</tr>
<tr>
<td>SRMR</td>
<td>Standardised Root Mean Residual</td>
</tr>
<tr>
<td>VIF</td>
<td>Variance Inflation Factor</td>
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CHAPTER 1
INTRODUCTION

1.1 Research Background

With economic, political and social pressures mounting, many governments around the world have begun to evaluate their performance and to look for ways to ‘do more with less’, including developing bureaucratic systems and structures to increase public satisfaction with public services and improve government efficiency (White and Bryson, 2018). New public management (NPM) reform is one of the most recognised initiatives aimed at improving public organisational performance (Verhoest et al., 2012; Pollitt and Dan, 2013; Kim and Cho, 2015). It was launched in the 1980s and has since been supported and promoted by many international bodies, such as the World Bank and the International Monetary Fund (IMF) (Schwab, Bouckaert and Kuhlmann, 2017; Verhoest, 2017). The vision of this reform is to adopt a private sector approach to public sector management (Hood, 2011; Verhoest et al., 2012). Accordingly, the work of implementation has been carried out through two main approaches: first, the transfer of a number of public services to the private sector directly through privatisation, outsourcing, competitive tendering and corporatisation (Schwab, Bouckaert and Kuhlmann, 2017), and second, the dismantling of large government institutions, such as ministries, into smaller institutions, such as agencies and public authorities with high managerial autonomy to enable a model that is more ‘business-like’ (Hammerschmid et al., 2018).

The second approach, known as agencification (Bouckaert et al., 2010; Verhoest et al., 2012; Hammerschmid et al., 2018), has ‘become a popular vehicle for executing a wide range of functions in a large number of countries’ in the last two decades (Pollitt et al., 2001, p. 272; Verhoest et al., 2012; Zahra and Jadoon, 2016). According to Verhoest (2017), the expanded managerial autonomy granted to these autonomous entities allows for a rapid response to the various circumstances and coping with progressive changes in users’ requirements, thereby reinforcing the concept of ‘let managers manage’. The autonomy of human resource management (HRM) is one of the essential pillars of this managerial autonomy (Verhoest et al., 2004; Verschuere, 2007; Yesilkagit and Van Thiel, 2008; Zahra and Jadoon, 2016). HRM autonomy allows the organisation to enact its own rules of personnel management and to choose the appropriate HRM system that best suits it in order to achieve its objectives, as opposed to traditional public sector institutions which are typically subject to a single common civil service law (Pollitt et al., 2004; Thiel and CRIPO team, 2009; Kim and
Cho, 2015; Zahra and Jadoon, 2016). Thus, the NPM doctrine considers that HRM plays a vital role in transforming traditional bureaucratic government entities into market-driven entities, thereby achieving improved organisational performance (Yesilkagit and Van Thiel, 2008; Thiel and CRIPO team, 2009; Verhoest et al., 2012; Zahra and Jadoon, 2016; Lin and Liu, 2016).

The impact of HRM on organisational performance has received increased attention across several disciplines in recent years. As NPM scholars have recognised the vital role that HRM plays in improving organisational performance in autonomous agencies, the link between HRM and organisational performance has also been at the centre of attention of strategic human resource management (SHRM) since the 1990s (Delery and Roumpi, 2017). Moreover, SHRM scholars argue that HRM systems can be a ‘source of sustainable competitive advantage’ (Pfeffer, 1994; Becker and Gerhart, 1996; Boxall, 1996; Delery and Roumpi, 2017). Researchers in the field of SHRM have exerted considerable effort in studying the direct and the indirect impacts of HRM systems on organisational performance (e.g. Ang et al., 2013; Kehoe and Wright, 2013; García-Chas et al., 2014; Gould-Williams et al., 2014; Fabi et al., 2015; Katou, 2017). Many studies have found that there is a positive relationship between HRM and organisational performance (Wright and Boswell, 2002; Combs et al., 2006; Lawler et al., 2011; Bello-Pintado, 2015; Wright and Ulrich, 2017). Most researchers believe that the effect of HRM occurs through ambiguous and complex relationships that start with the nearest variables and is reflected in the form of attitudes and behaviours of the employee—so-called ‘employee outcomes’; this effect then shifts directly or indirectly to distant variables such as operational outcomes and financial outcomes (Colakoglu, Lepak and Hong, 2006; Jiang et al., 2012; Issue and Held, 2015; Katou, 2017). Notwithstanding the theoretical and empirical progress in this area, there is much that is still unknown (Wright and Ulrich, 2017; Jiang and Messersmith, 2018). In the next section, the most critical knowledge gaps in the literature related to this research will be explained.

* In the SHRM literature, the notion of an HRM system is commonly used interchangeably with other terms, such as HRM or high-performance work system (HPWS) (White and Bryson, 2018), although HPWS has recently become the most frequently used term in the SHRM literature to describe an HRM system (Guest, 2017). HPWS now dominate the field of SHRM and are considered a powerful means of improving organisational outcomes (e.g. Arthur, 1994; Huselid, 1995; MacDuffie, 1995; Delery and Doty, 1996; Ichniowski et al., 1997; Delery, 1998; Boselie et al., 2001; Combs et al., 2006; Bowen and Ostroff, 2004; Chuang and Liao, 2010; Lin and Liu, 2016). Thus, this study will use the term HPWS to refer to an HRM system.
1.2 Knowledge Gaps in the Literature

An extensive review of the literature on the HRM-organisational performance link revealed several significant knowledge gaps in this area of research, as outlined below.

First, there is no theory of HRM on which researchers could base the conceptualisation and operationalisation of HRM systems (Becker and Gerhart, 1996; Guest, 1997; Paauwe and Boselie, 2005; Lepak, Liao et al., 2006; Guest, 2011; Jiang and Messersmith, 2018). Therefore, in the literature, for each study on the HRM-organisational performance link, a different set of HRM practices is used (Delery and Roumpi, 2017). This lack of consensus among the different studies on the components of the HRM system makes it difficult to compile and compare the results from all of these studies, which may also hinder attempts at theory-building (Jiang and Messersmith, 2018). However, in recent years, there has been a trend in favour of the synergy argument of HRM systems, which has supported the selection of AMO-based HRM practices to form ‘bundles’ of practices that (1) enhance capacity, (2) promote motivation, and (3) enhance staff participation (Saridakis et al., 2017; White and Bryson, 2018).

Second, there is a lack of consensus on how organisational performance should be measured (Saridakis, Lai and Cooper, 2017). There is a belief among academics that the strong focus on financial indicators to measure organisational performance comes at the expense of other non-financial indicators, which contributes to our lack of understanding of the HRM-organisational performance link (Legge, 2001; Kaufman, 2010; Guest, 2011; Cafferkey and Dundon, 2015). Therefore, there is a call in the literature to adopt the stakeholder approach, which focuses on non-financial indicators, in contrast to the shareholder approach, which focuses more on the use of financial indicators (Paauwe and Boselie, 2005). The shareholder approach has been widely criticised because it focuses on the short term and does not rely on any strategic view that focuses on more in-depth and more valuable indicators such as, for example, quality, stakeholder satisfaction and value added (Lee, 2008; Shahin, Naftchali and Pool, 2014; Abu Khalaf, Hmoud and Obeidat, 2019). Therefore, more emphasis should be placed on the perspective of stakeholders as it reflects the impact of proximate variables such as employees and customers (Boselie, Dietz and Boon, 2005; Wright and Nishii, 2007). By understanding this, more significant development in this area could be achieved. According to Cafferkey and Dundon (2015), previous research that has relied heavily on the perspective of shareholders is only concerned with remote variables such as financial results, and this has not allowed us to clearly understand the mechanisms that influence this relationship. Moreover, the public sector lacks any of the essential traditional financial indicators of financial
performance of the private sector, such as net profit, market share and return on equity (Boxall and Purcell, 2011; Knies et al., 2018; White and Bryson, 2018). Therefore, when examining organisational performance in the context of the public sector or non-profit sectors, performance should be measured based on value added to society and multiple stakeholders (Moore, 2000; Knies et al., 2018).

Third, the mechanism through which HRM systems influence organisational performance remains a gap in the literature that is often referred to as the ‘black box’ (Takeuchi et al., 2007; Messersmith et al., 2011; Kloutsiniotis and Mihail, 2018). Focusing on the intervening mechanisms could expand our understanding of how this influence occurs (Innocenti, Pilati and Peluso, 2011; Van de Voorde and Beijer, 2015; Kloutsiniotis and Mihail, 2018). Thus, there is a call in the literature to develop a more complex model that examines more proximal variables that allows for the inclusion of a different set of employee outcomes (Guest, 2011; Jiang, Lepak, Han, et al., 2012; Mostafa and Gould-Williams, 2014; Issue and Held, 2015). The neglect of staff perceptions of the HRM system has been criticised in the examination of the HRM-organisational performance link (Nishii and Wright, 2008). Therefore, the focus has recently shifted to the study of this link from the micro-level perspective, thereby taking into account employee perceptions resulting from their experience of the HRM system in the hope that this will contribute to finding a way to open the ‘black box’ (Jiang, Takeuchi and Lepak, 2013; Kehoe and Wright, 2013; García-Chas, Neira-Fontela and Castro-Casal, 2014). Recently, the literature has shed light on service climate as one of the potential variables that may affect and be influenced by the HRM-organisational performance link (Lin and Liu, 2016). So far, few studies have addressed the role of service climate in this relationship (Rogg et al., 2001; Gahan and Buttigieg, 2008; Heffernan et al., 2016). Thus, this study will be part of the effort to develop service climate theory. According to Dietz, Pugh and Wiley (2004) and Mayer, Ehrhart and Schneider (2009), there are still opportunities to help develop service climate theory by examining additional moderators in the relationship that connects service climate with customer satisfaction.

Fourth, there is no consistency among previous studies regarding how HRM systems affect organisational performance. This overshadows the building of a theory describing this relationship and puts practitioners and human resources managers in an awkward position when attempting to apply HRM systems. There are two views among scholars on how this relationship occurs. The first supports the universalistic view that regardless of the strategy used or the context, HRM systems will always lead to positive organisational performance (Paauwe and Boselie, 2005; Katou, 2009; Zhang and Morris, 2014; Katou, 2017). The other school of thought supports the best-fit view that considers that there is a need to align the system first with a context and strategy in order to achieve
positive organisational performance (Paauwe and Boselie, 2005; Zhang and Morris, 2014; Katou, 2017).

Fifth, there is no consistency among previous studies with regard to determining the source of sustainable competitive advantage in the HRM-organisational performance link (Delery and Roumpi, 2017). The SHRM camp (e.g. Pfeffer, 1994; Becker and Gerhart, 1996) considers the HRM system to be a source of sustainable competitive advantage, while the human capital camp (e.g. Boxall, 1998; Nyberg et al., 2014) argues that human capital resources are the source of this competitive advantage. Therefore, there is a call in the literature to provide a more practical approach for organisations so that they can achieve competitive advantage (Delery and Roumpi, 2017).

Finally, most empirical research on the HRM-organisational performance link has been based in the context of the private sector or Western countries (Knies et al., 2018). While Rees (2013) attributed the decline in the performance of the public sector in many developing countries to weak HRM systems, there is a paucity of studies in developing countries on this relationship (Knies and Leisink, 2017). Therefore, in order to generalise the conclusions of published studies, further studies should be undertaken in new contexts to ensure that the results obtained previously are not limited to the West (Guest, 1997; Beardwell et al., 2004; Paauwe and Boselie, 2005; Paauwe, 2009; Guest, 2011). Also, there are numerous calls to investigate the HRM-organisational performance link in the autonomous and semi-autonomous organisations resulting from the agencification process since the vast majority of researchers have not considered these types of organisations and there is dearth of empirical studies in this area (Verhoest et al., 2012; Bezes and Jeannot, 2018; Blom et al., 2018; Farooq et al., 2018; Hammerschmid et al., 2018). There are also very few empirical accounts that support claims and assumptions about the positive impact of agencification on quality and performance in the public sector (Overman and van Thiel, 2016).

1.3 Research Questions

After reviewing the most critical gaps in the current literature related to the relationship between HRM and organisational performance, the most significant gap was found to be related to understanding the mechanism by which HRM systems influence organisational performance, namely the ‘black box’ of SHRM scholars (Takeuchi et al., 2007; Messersmith et al., 2011; Kloutsiniotis and Mihail, 2018). Thus, the central question of this study pertains to the mechanism by which perceptions of an HPWS affects customer satisfaction in the public sector. To unlock the black box of this mechanism, the employee outcomes and service climate roles of the relationship
between the HPWS and customer satisfaction will be examined as well as the moderating role of agencification. Thus, the overarching research question in this thesis is **What is the mechanism by which perceptions of an HPWS affects customer satisfaction?**

In order to answer that fundamental question, the following sub-questions arise:

1. What is the relationship between employee perceptions of the HPWS and employee outcomes, service climate and customer satisfaction?
2. To what extent do employee outcomes and service climate mediate the relationship between the HPWS and customer satisfaction?
3. To what extent does agencification moderate the relationship between the HPWS and customer satisfaction?

**1.4 Research Aim and Objectives**

Based on the gaps in the current literature (see Section 1.2) and the calls of scholars and researchers to develop a more complex theoretical framework to open the ‘black box’ of the relationship between HRM and organisational performance (e.g. Paauwe, 2009; Jiang, Lepak, Hu, *et al.*, 2012; Mostafa and Gould-Williams, 2014; Issue and Held, 2015), the present study will therefore rely on a micro-level perspective to study this relationship based on staff perceptions of their experience of the independent and dependent variables under study, in accordance with the recommendations of the literature (e.g. Nishii and Wright, 2008; Purcell and Hutchinson, 2007; Jiang, Takeuchi and Lepak, 2013). Also, the term *HPWS* will be used in this study to refer to HRM systems, as it has recently become the most widely used term in the SHRM literature to describe HRM systems (Guest, 2017). The HPWS, which is the independent variable, will be composed of eight practices based on the AMO model that enhance staff abilities, motivation and opportunities to contribute to organisational performance (Delery and Roumpi, 2017; Jiang and Messersmith, 2018). These practices are recruitment and selection, internal career ladders, training, performance appraisal, employee voice and participation, incentives and rewards, job rotation and broadly defined jobs. The dependent variables in this study include employee outcomes, service climate and customer satisfaction. The employee outcomes will be measured by job satisfaction, commitment, trust, motivation and intention to remain, in order to study the different faces of this construct simultaneously, following the recommendation of Mostafa and Gould-Williams (2014).
Thus, this study set out to examine the effects of the HPWS, employee outcomes (measured in terms of job satisfaction, commitment, trust, motivation and intention to remain) and service climate on customer satisfaction. The study contributes to our understanding of the ‘black box’: the mechanism by which perceptions of an HPWS affects customer satisfaction. The study examined the direct effects of employee outcomes and service climate on customer satisfaction as well their mediating effects in the relationship between the HPWS and customer satisfaction. Further, this study explored the moderating effect of agencification on the HPWS-customer satisfaction relationship. Thus, this study not only provides insight into how an HPWS affects customer satisfaction through its direct and indirect impacts on employee attitudes and behaviours and service climate but also contributes to the literature in the fields of SHRM and NPM. Accordingly, the primary objectives of this research are as follows:

1. to examine the relationships between employee perceptions of the HPWS, employee outcomes, service climate and customer satisfaction in the Omani public sector;
2. to investigate the role of employee perceptions of the HPWS and employee outcomes on the enhancement of service climate;
3. to investigate the role of employee outcomes and service climate on the achievement of customer satisfaction;
4. to examine the mediating effects of employee outcomes and service climate on the relationship between the HPWS and customer satisfaction; and
5. to examine the moderating effects of agencification on the relationships between the HPWS, employee outcomes, service climate and customer satisfaction.

1.5 Significance of Research Context: Oman

Before discussing the importance of the context of this research, some background information on Oman will be provided to give an overview of the country’s economy, labour market and public sector.

1.5.1 A brief economic profile

Oman is a middle-income monarchy, and its economy is mainly dependent on oil revenues as the primary source of income. Petroleum activities (oil and natural gas) play a vital role in the overall
economic growth of the Sultanate despite the reduction of its share in GDP in 2016. The revenues from petroleum activities as a percentage of GDP stood at 27.1 per cent in 2016 and accounted for 68.2 per cent of state revenues (Central Bank of Oman, 2017). Oman’s economy is characterised as vulnerable to oil shocks. The country is facing many challenges regarding the fluctuation of oil prices and high public spending. Figure 1.1 shows how the oil revenues represent a significant contributor to the total revenues of the state. It also shows how the state budget has been dramatically affected by the sharp drop in oil prices since 2014. Central Bank of Oman (2017) reported that the state treasury lost over 67 per cent of its oil revenues in 2016 compared to the level in 2014. The year 2016 witnessed the lowest selling price of Omani oil, which in January reached below US$24 a barrel compared to about US$45 dollars a barrel as was estimated in the budget.

Figure 1.1: Share of oil revenues in total revenue

According to the National Centre for Statistics and Information in Oman, the average daily production of crude oil was almost a million barrels in 2016, an increase of 2.4 per cent over the previous year. However, the fiscal position further deteriorated in 2016, mainly due to a significant drop in oil revenues as the actual average Omani oil price was much lower, as noted above, than the price assumed in the budget estimates (US$45). The annual average price of Oman’s crude oil in 2016 had declined by 29 per cent compared to the previous year. Consequently, the government

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*Gross domestic product (GDP) is the market value of all final goods and services from a nation in a given year.
revenues declined by 16 per cent in 2016, totalling US$19.8 billion compared to US$23.7 billion the previous year. This situation worsens the budget deficit situation; the total fiscal deficit recorded in the Sultanate in 2016 was US$13.8 billion, representing an increase of 14.4 per cent over the previous year. Overall, Oman has witnessed severe budget deficits in recent years due to a fall in oil prices below the fiscal breakeven oil price. For instance, the fiscal breakeven price was US$73 a barrel in 2016 compared to its actual average, which was around US$40. Figure 1.2 shows Oman’s budget deficits as a percentage of GDP over the last two decades. It is evident that the vast total expenditure, which exceeds the total revenues over most of the years—even the years of the oil price boom from 2010 to 2013—is the leading reason for the budget deficit.

![Image of bar chart showing budget deficits as a percentage of GDP over two decades.]

**Figure 1.2:** Oman’s budget deficits as a percentage of GDP

An analysis of the total government spending reveals that the level of expenditure has been expanding as a percentage of total expenditure in recent years (Figure 1.3). The National Center for Statistics and Information (2017) reported that the item encompassing salaries and entitlements of employees in the public sector represents 75 per cent of the total current expenditure.
Moreover, a recent report by the IMF following recent discussions with Oman in April 2018 concluded that a significant additional fiscal adjustment was needed to address existing spending constraints, particularly concerning the wage and subsidies bill. Also, the IMF added the following in its report:

Structural reforms that promote private sector development, productivity and competitiveness gains, diversification, and job creation for nationals are paramount. Tackling labour market inefficiencies—for example by better aligning public sector wages and benefits with the private sector, encouraging more labour market flexibility for nationals, and sustaining efforts to improve education and training—is key in this respect (International Monetary Fund, 2018).

It is worth mentioning that the total oil reserves for Oman were estimated at 5,242.5 million barrels in 2016, and this is another challenge because oil is a non-renewable resource. That means that with the current daily production of oil, Oman’s total reserves could start running out in less than fifteen years.

1.5.2 An overview of Oman’s labour market

The total number of employees in Oman was almost 2.3 million in 2016. Male workers represented 85 per cent of the total labour force in 2016, compared to 15 per cent females. Also, eight out of 10
workers in the Sultanate were expatriates. Figure 1.4 illustrates that expatriates have constituted the majority of the labour market in the Sultanate in the last decade: in 2016, 89.6 per cent worked in the private sector, while 10.4 per cent worked in the government sector. The number of expatriates in the workforce in the private sector was 1,787,979 in 2016, representing 88.4 per cent of this sector. Omani workers only hold 11.6 per cent of private sector positions (National Center for Statistics and Information, 2017).

Figure 1.4: Number of workers in the labour market in Oman

One of the key macroeconomic objectives of the government during recent years has been the generation of adequate employment opportunities for Omanis (Central Bank of Oman, 2017). The International Labour Organization (2011) estimated the unemployment rate to be about 20 per cent on average but about 50 per cent for the youth. As the World Bank (2017) reported in its last outlook for Oman’s economy in October 2017:

The main social concern for Oman is the lack of jobs . . . a pressing problem in a country where almost 40 per cent of the population is younger than 25 years old. Oman will have to generate 45,000 jobs annually to address the problem, and the ongoing effort to replace expatriates with Omanis are insufficient without an improvement in the environment for private sector job creation (World Bank, 2017).

Notwithstanding efforts of the government to create more jobs for Omanis in both the public and private sectors, the sharp drop in oil prices, which is the country’s primary source of income, the widening of fiscal and current account deficits and the rapid rise in government debt (as discussed
in Section 1.5.1) have forced the government to slow its employment generation in the public sector in recent years. On the other hand, the government has encouraged young people to work in the private sector or start small businesses. However, the fairly strong preference for public sector jobs amongst young Omanis has been an obstacle to creating more jobs for them outside the public sector (International Labour Organization, 2011). This strong preference for public sector jobs amongst Omani jobseekers has become a new challenge for the government and led the National Center for Statistics and Information in Oman to conduct an annual poll to measure the trends in Omani youth’s attitudes toward work. The last poll shows that 70 per cent of higher education students and 92 per cent of jobseekers would prefer to work in government jobs (National Center for Statistics and Information, 2016).

Figure 1.5 shows that seven out of every 10 students in higher education expressed their preference to work in the public sector in 2016. What stands out in this figure is the vast disparity between males and females, where the percentage of females expressing this preference is about 80.6 per cent, while among males it declines to 50.5 per cent. The results indicate that the most critical factors that determine job choice among young Omanis, whether male or female, are stability and job security, the right salaries and incentives, and excellent opportunities for promotion.

![Figure 1.5: Preference for public sector jobs amongst Omani youth (18–30 years) (in %)
Source: National Center for Statistics and Information (2016)](image)

In response to the increasing number of jobseekers and popular pressure, the government offered 50,000 jobs in 2011 (De Bel-Air, 2015) and another 25,000 jobs in 2017. However, for how long can the government continue to generate more jobs for the thousands of young Omanis entering the labour market each year while, at the same time, tackling its current spending rigidities and meeting
its commitment to undertake fiscal consolidation and promote macroeconomic balance (International Monetary Fund, 2018)?

The Minister of Civil Service stated before the Shura Council on 26 January 2014 that among the most important challenges facing employment in the Sultanate is the insistence of the majority of jobseekers on employment in the public sector, specifically in the civil service sector, and their reluctance to work in other sectors, especially the private sector, despite the impossibility of the government sector absorbing and employing everyone and considering that the private sector remains the sector that has the greatest long-term potential of all other sectors to absorb the national workforce.

It stands to reason that the public sector will not be able to continue to be the primary source of employment indefinitely, as this practice will lead to overstaffing or ‘hidden unemployment’ in this sector. Moreover, various other disadvantages will become noticeable regarding the efficiency and effectiveness of government units. It is also impossible to ignore the financial burdens that will be imposed on the general budget of the state, which is already suffering from a persistent annual fiscal deficit. All these circumstances cast a dark shadow over the long-term sustainability of the Omani economy.

1.5.3 Public sector in Oman

There are 23 ministries and 15 authorities in the Sultanate. However, the population for the current study will be limited to 10 ministerial departments and five non-ministerial departments as they represent the core services of the public sector in Oman. The public sector follows civil service law, which is applied to the ministerial departments (Ministries) and overseen by the Civil Service Council. For the non-ministerial departments (public authorities), each entity has the right to establish its own HRM system. However, on 11 November 2013, His Majesty the Sultan of Oman ordered the formation of a government committee to review current civil service law and other HRM systems in force in the various units of the civil state apparatus to unite them under the umbrella of unified civil service law. The Royal Order set a date of not later than July 2014 for the preparation of this new law. However, to date, this law has not been issued. Thus, the current study, which was conducted under the old civil service law and other HRM regulations, will serve, after the promulgation and application of the Unified Civil Service Act, as a point of reference for future research in this area in Oman.
Among the few surveys conducted to assess the performance of the public sector in Oman, the National Center for Statistics and Information (2016) asked higher education students to assess their satisfaction with government performance in general. Figure 1.6 shows a low rate of satisfaction with government performance among students in higher education, falling to 32 per cent in 2016 compared to 39 per cent the previous year.

![Figure 1.6: Satisfaction with government performance (in %)](chart)

Source: National Center for Statistics and Information (2016)

On the other hand, the analysis of the state budget for 2016 (Table 1.1) shows that the average employee cost in ministerial departments was around US$33,000 compared to more than US$82,000 for non-ministerial departments, which is a difference of 150 per cent. Regarding the average revenue per employee, ministerial departments achieved almost 25 per cent more revenue compared with the non-ministerial departments. Even the average deficit of the current budget has been found to be 54 per cent less in ministerial departments.

**Table 1.1: Budget Analysis for Ministerial and Non-Ministerial Departments for 2016**

<table>
<thead>
<tr>
<th>Department Type</th>
<th>Average Deficit of Current Budget</th>
<th>Average Revenue per employee US$</th>
<th>Average employee cost US$</th>
<th>Difference (in %) (revenue-cost)</th>
</tr>
</thead>
<tbody>
<tr>
<td>Ministerial</td>
<td>-3.7%</td>
<td>29,483.4</td>
<td>32,893.2</td>
<td>-11.6%</td>
</tr>
<tr>
<td>Non-Ministerial</td>
<td>-5.7%</td>
<td>22,224.9</td>
<td>82,441.6</td>
<td>-270.9%</td>
</tr>
<tr>
<td><strong>Difference (in %)</strong></td>
<td><strong>-54.1%</strong></td>
<td><strong>24.6%</strong></td>
<td><strong>-150.6%</strong></td>
<td></td>
</tr>
</tbody>
</table>

Source: Ministry of Finance (2017)
In addition to the higher average wages of the employees of the public authorities versus the ministries, the Ministry of Finance determined in its Financial Publication No. 11 of 2016 (dated 19 April 2016) that there are allowances and unique benefits granted to the employees of the public authorities that do not fall within the fundamental rights associated with the job, are excluded from the framework of public expenditure and are often of a social, recreational or consumerist nature which impose financial burdens on the budgets of public authorities, as shown in Table 1.2. Therefore, the Ministry of Finance has directed all public authorities to stop all privileges granted to employees outside the framework of the salary, to amend the existing HRM systems in line with what is stated in the aforementioned publication and to submit the related draft regulations to the Ministry of Finance no later than the end of July 2016.

<table>
<thead>
<tr>
<th>Loans</th>
<th>Cash rewards</th>
</tr>
</thead>
<tbody>
<tr>
<td>Loans for an employee for conditions such as illness, suffering</td>
<td>Pay thirteen or more staff salaries</td>
</tr>
<tr>
<td>Housing loans</td>
<td>Rewards for public events (Ramadan, holidays)</td>
</tr>
<tr>
<td>Interest-free loans</td>
<td>Employee bonuses not tied to performance standards</td>
</tr>
<tr>
<td>Payroll advances</td>
<td>Executive management pays special bonuses</td>
</tr>
<tr>
<td>Loans via Oman Housing Bank for which the unit bears its interest</td>
<td>Rewards for employees with academic degrees</td>
</tr>
<tr>
<td></td>
<td>Discretionary bonuses standard</td>
</tr>
<tr>
<td></td>
<td>Other rewards</td>
</tr>
<tr>
<td>Cash donations</td>
<td></td>
</tr>
<tr>
<td>Distinguished gifts for employees</td>
<td></td>
</tr>
<tr>
<td>An individual financial or in-kind gift upon marriage</td>
<td></td>
</tr>
<tr>
<td>Financial or in-kind donations to new employees</td>
<td></td>
</tr>
<tr>
<td>Study allowances</td>
<td></td>
</tr>
<tr>
<td>Cover the cost of the study of children of the employees</td>
<td></td>
</tr>
</tbody>
</table>

Table 1.2: Some of the Privileges and Allowances Granted to Employees in the Public Authorities

Source: Ministry of Finance (2016)

Surprisingly, the Ministry of Finance had to issue Financial Publication No. 5 of 2017 (dated 10 January 2017) to confirm the requirement of all public authorities to submit drafts of HRM systems as soon as possible because it had not yet received them (Ministry of Finance, 2017). The low rate or absence of response by those public authorities is unacceptable, especially in light of the call of the Ministry of Finance to rationalise and reduce expenses and raise the efficiency and effectiveness of government spending to reduce the impact of the fall in oil prices and ease the financial burden on the public treasury of the state.

There is a growing body of evidence to suggest that significant differences exist in the number and type of financial privileges granted to employees in the ministries compared to the public authorities,
where the cost per employee based on the salaries and wages and other financial benefits (as mentioned above) is higher. In the shadow of the complicated situation of the state budget, the persistent pressure of jobseekers and the inability to create new job opportunities to accommodate thousands of Omani youth entering the labour market annually, an interesting question has been raised about the efficiency of the existing model of the non-ministerial departments and whether or not it is succeeding in improving the performance and quality of service in the public sector.

1.5.4 Human resource management in Oman

The state of HRM in Oman, like other Middle East countries, has not been well documented in comparison to the rest of the world (Budhwar et al., 2018). Besides, the challenges facing the HRM in this important region of the world are complex and unique, so there is increasing interest among academics and practitioners in identifying the best types of HRM systems appropriate for this region (Budhwar et al., 2018). According to Al-Jahwari and Budhwar (2016), these challenges lie in the specificity of the culture of the society in this region, which is formed directly by factors such as religion, language, ancestry and shared history. The researchers found that in general Islam plays a significant role in shaping the set of values and beliefs within these societies, which in turn determine the formation of the framework of inter-organisational relations between workers and employers (Smith, Achoui and Harb, 2007). These Islamic values and beliefs have laid down the foundations of Islamic business ethics through which many organisational behaviours can be understood (Ali, 1992; Alam and Talib, 2016; Clercq et al., 2018). Islam, in essence, is more than a belief, because it not only organises acts of worship, but extends them to all aspects of social, economic and political life, and this is truly an integrated way of life (Ali and Al-Owaihan, 2008; Branine and Pollard, 2010). The Holy Quran, the first source of legislation in Islam, promotes honesty and justice in trade and equity in labor relations, encouraging new learning skills, cooperation and consultation in decision making, enabling the individual and the community to contribute effectively to creating an ideal and efficient working environment (Branine and Pollard, 2010; Budhwar et al., 2018).

In Oman, the triad of Islam, the tribe and the family plays a pivotal role in shaping the philosophy of HRM (Al-Hamadi, Budhwar and Shipton, 2007). Despite the existence of fundamental contradictions between the values of Islam in terms of justice, equality, honesty and integrity in all transactions between members of society, and between them and some practices that arise as a result of social pressures associated with the strength of the influence of the tribe and the family, for instance nepotism known as ‘wasta’ (Al-Jahwari and Budhwar, 2016; Budhwar et al., 2018). The tribe generally plays a significant role in tribal societies, where the tribe represents one of the main
pillars of community formation. The tribe is defined as a group of people who often belong to the same lineage because of the name of the Grandfather or the name of the tribal alliance (Al-Barwani and Albeely, 2007). One of the distinguishing features of Omani society is the existence of the so-called extended family (Al-Hamadi, Budhwar and Shipton, 2007). On the other hand, this social cohesion may impose the pressure, responsibility and duty of all members of this extended family in terms of the importance of cooperation of all to ensure their well-being, which may contribute to the growth of some misconduct in society such as nepotism (Al-Barwani and Albeely, 2007; Al-Jahwari and Budhwar, 2016).

In addition to these factors, there are several other factors that contribute to defining the frameworks for the design of the HRM systems in the Sultanate, including the government policies, especially the policy of Omanization (i.e. replace foreign staff with skilled and qualified national workers) and the policy of reconciling the requirements of globalization and the Omani societal culture (Al-Jahwari and Budhwar, 2016). Also, no pressure from some international bodies such as the World Bank, IMF and the International Labor Organization to devote some of the trends in HRM should be overlooked such as reducing salary expenses, the number of employees in the government sector, adopting privatization policies and moving towards agencification (Forstenlechner, 2009, Swailes, Said and Fahdi, 2012; Schwab, Bouckaert and Kuhlmann, 2017; Verhoest, 2017). According to Al-Jahwari and Budhwar (2016), “despite the available information on the strong influence of Islam and the Omani societal culture, we do not have sufficient empirical evidence to talk about a model or argue for a distinct regional or Islamic or even a context-specific HRM model in Oman. The bits of evidence that we have on the nature of HRM practices in Oman indicate the widespread existence of a traditional, administrative and reactive form of HRM with loosely connected processes”. Thus, the design of HRM systems in the Omani context requires, according to Al-Jahwari and Budhwar (2016), in addition to the above, consideration of the following:

1. Cultural orientations, which it refers to trends corresponding to cultural vision as a set of deep assumptions and values relating to relations between humans and humans and their environment (Kluckhohn and Strodtbeck, 1961), found to be linked in the Omani context to the preferences of HRM practices as described in the study of Aycan et al. (2007).

2. The growing awareness of young generations and the beginnings of political maturity about the importance and impact of ‘their collective power’ towards achieving legitimate demands (Sidani and Thornberry, 2013).

3. Strong preference for Omani youth seeking jobs for government jobs as detailed above (see Section 1.5.2).
4. A gap in the skills and culture of work prevailing in the outcomes of the educational system and what the labour market in Oman requires. This requires HRM systems to address this problem, for example, by intensifying the training aspect to enhance skills practices (Swailes, Said and Fahdi, 2012).

As Branine and Pollard (2010) and Al-Jahwari and Budhwar (2016) concluded, what Oman’s HRM needs now is to be designed to integrate the culture of society with the requirements of global competitiveness, so that HRM practices are more efficient in providing the skills, motivation and opportunity to develop the workforce in the Sultanate.

1.5.5 Significance and rationale for the context

The most important rationale behind the selection of the Omani context for this study is that it shares the same unique challenges that HRM faces in many Middle Eastern countries, as detailed in subsection 1.5.4, prompting many academics to call for intensified research on HRM studies in the light of these challenges (e.g. Budhwar and Mellahi, 2007; Al-Hamadi, Budhwar and Shipton, 2007; Smith, Achoui and Harb, 2007; Aycan et al., 2007; Branine and Pollard, 2010; Branine and Pollard, 2010; Afiouni, Karam and El-Hajj, 2013; Afiouni, Karam and El-Hajj, 2013; Al-Jahwari and Budhwar, 2016; Budhwar et al., 2018). These types of challenges, based primarily on societal culture, have not been dealt with in detail in the literature, as in the case of developed countries. In their review of the state of HRM in the Middle East, Budhwar and his colleagues (2018) concluded that ‘with the growing business interest in the Middle East, both academics and practitioners are interested in finding out about the kind form systems suitable for the region’. The Middle East is a strategic area with enormous potential for international companies and investors, so there is a need to learn more about HRM issues, such as similarities or differences between HRM systems in the West, for example, and those in the region. This will encourage increased investment and access to this region, as well as improving the efficiency of HRM systems in various public and private sectors in the region. Besides, there are common challenges among different countries of the world that cast a shadow over HRM issues: population growth and global economic volatility. An increase in population in any country entails enormous expenses to support the various services and infrastructure. Also, there is a continual need to create more jobs for thousands of young people entering the labour market annually.

In Oman, the context of this research, along with the challenges of the societal culture, HRM policymakers face other challenges in terms of population growth and economic volatility. In this
country, more than 45 per cent of the population is under 20 years of age. Therefore, there is a need to create at least 40,000 jobs a year. An additional challenge comes in the form of declining oil prices, the primary source of the income in Oman, and the negative consequences for the state’s economic and financial sustainability, as witnessed by slow rates of economic growth and the widening fiscal deficit. Several international organisations, including the International Labour Organization, World Bank and IMF, have warned Oman that the consequences of the continued deterioration of financial and economic conditions with the aggravating factor of the matter of job seekers might lead to a state of economic and social instability. However, it is surprising that in a country where the problem of job seekers is growing, there is annual growth in the expatriate labour force. The labour market in Oman suffers from a significant imbalance in its structure of workers, where the Omani only represented 10 per cent of total employment in 2016. What makes this situation even worse is that most young Omani (70%) prefer to work in the public sector. However, this sector has reached the stage of saturation and is no longer able to absorb and employ any more national labour. For existing HRM systems in the country, which should be designed to take into account the above challenges, Al-Jahwari and Budhwar (2016) believe that ‘HRM is a growing phenomenon in Oman, but its practices are still largely traditional and reactive. The various HR processes are often designed with Western practices in mind. But, when carried out, the practices are often not well aligned to business strategies, they are implemented for narrow administrative purposes and remain loosely connected to each other’. Thus, the Omani context is the appropriate context for this study, which is aimed at understanding the mechanism of the impact of HRM system on organisational performance. This will enable the researcher to test the coherence and consistency of the selected practices to form the HPWS and their contribution to enhancing organisational performance in the context of the Omani public sector. This study will, therefore, enrich HRM literature in the Middle East and Oman in particular. Thus, this study will enrich the literature of human resource management in the Middle East and the Sultanate of Oman in particular. The results can also be used to understand the nature of HRM systems in the region by academics and practitioners.

On the other hand, in recent years, the government has expanded the process of agencification, and new public authorities have been established. These public authorities aim to carry out specific tasks that previously fell under the responsibility of government ministries. This policy is aimed at improving the performance, efficiency and quality of public services. However, an analysis of the financial implications of this policy reveals that the state budget has borne additional burdens and has lost the opportunity to direct these funds to other, probably more feasible, sectors. As a result of
the deteriorating financial situation of the Sultanate and its impact on the future financial sustainability of the state, the question of the feasibility of supporting the government’s direction towards agencification has been raised. The Shura Council, the lower chamber of Oman’s parliament, adopted this issue through its vital role in monitoring government performance. As a result, this above-mentioned study emerged and received full support and funding from this council. Since the debate on agencification is certainly not limited to Oman only, many studies in the NPM literature point to conflicting evidence regarding the feasibility of this shift to the agency model. Many scholars of NPM believe that the study of the impact of agencification on improving organisational performance levels and the quality of services provided in the public sector has not received sufficient attention or documentation, so it remains to be shown whether the resulting autonomous agencies have really improved the efficiency and quality of service (Talbot, 2004; Pollitt and Talbot, 2004; Verhoest et al., 2004; Christensen and Lægreid, 2006; Verhoest et al., 2012; Hood and Dixon, 2015; Mortensen, 2016; Verhoest, 2017; Hammerschmid et al., 2018). Thus, in light of a similar set of challenges faced by many developing countries, choosing Oman for the context of this study will enrich the literature in this area.

1.6 Significance of this Research

The present research reveals ample opportunities for cross-disciplinary collaboration to extend knowledge and to advance the understanding of the ‘black box’ that governs the relationship between the HRM system and organisational performance by combining different perspectives and efforts of two main fields of research: NPM and SHRM. Moreover, it will contribute to bridging several significant theoretical and empirical gaps in this area of research, which have already been addressed in Section 1.2. Therefore, it is expected that this study will have a significant academic impact by contributing to filling the gaps in previous studies by developing a theoretical framework which takes these gaps into account, as explained in detail in Chapter 3.

Further impacts of this study in the economic and societal realms are expected to result from its contributions to raising awareness of the importance of SHRM in the public sector and to encouraging policymakers and senior management in the public sector to focus more on SHRM to improve organisational performance to make public organisations more effective and efficient while reassessing the current trend towards agencification. All the anticipated contributions of this study will be elaborated in greater detail in Chapter 6.
1.7 Research Methodology

The present study, for which a cross-sectional survey strategy has been adopted, is situated within the positivist research paradigm. In accordance with the nature of the data required for this study, a self-completed questionnaire was developed and implemented with targeted professionals (middle/line managers, section heads and employees) who have a direct connection with end users/customers in 15 governmental entities in the public sector in Oman: 10 ministerial departments and five non-ministerial departments.

The study data were based on judgment sampling because it helped the researcher to reach those employees with a direct connection to end users within the target population. Judgment sampling is usually used when there is a limited number of people who have the required information (Sekaran and Bougie, 2016). In this case, staff with a direct relationship to customers are most likely to provide a reliable assessment of customer satisfaction with the level of service provided to them.

The data were analysed using the Statistical Package for Social Sciences (SPSS) and partial least squares (PLS) structural equation modelling (SEM).

1.8 Structure of the Thesis

This thesis is divided into six chapters, in addition to the current one, as follows:

*Chapter 1: Introduction*

This chapter provides an introduction to this thesis and presents the importance of this research and the nature of the gaps that it intends to contribute to filling in the fields addressed. The research context of this study is also reviewed and background and detailed information supplied to support the rationale for this context. This chapter also presents the research questions, the aim, and objectives of this research and provides a brief description of the research methodology.

*Chapter 2: Literature Review*

In this chapter, further details on agencification are provided along with a critical review of the literature on NPM. In addition, this chapter provides a critical review of the most influential SHRM literature and presents the foundational studies that have examined the relationship between the HPWS, employee outcomes, service climate and customer satisfaction. Also, the prevailing theories in the literature regarding this relationship will be presented.

*Chapter 3: Development of Theoretical Framework and Hypotheses*
After reviewing the relevant literature in Chapter 2, this chapter presents the development of the theoretical model and the research hypotheses.

*Chapter 4: Methodology and Research Design*

This chapter identifies the methodology and design of the research used to collect and analyse data to examine the research hypotheses. It aims to link the conceptual framework developed in Chapter 3 with the empirical results presented in Chapter 5. This chapter is organised around three main themes: the research paradigm, the research strategy, and the research design.

*Chapter 5: Analysis and Results*

This chapter focuses on the descriptive analysis, data preparation and screening, and data analysis. The Statistical Package for Social Sciences (SPSS) was used for the descriptive analysis of the data and the data preparation and screening. For data analysis, partial least squares structural equation modelling (PLS-SEM) was used.

*Chapter 6: Discussion and Conclusion*

This chapter discusses the main results of the current study and its theoretical and practical implications by discussing the empirical results of the data in Chapter 5 followed by the conclusions of this research. The practical effects and contributions of the study will be presented. Also, some limitations of this study will be discussed. Finally, several suggestions are offered regarding future research directions.
CHAPTER 2
LITERATURE REVIEW

2.1 Introduction

In this chapter, as outlined in Figure 2.1, further details on agencification are provided along with a critical review of relevant NPM literature. Also, this chapter will provide a critical review of the primary literature related to SHRM and presents key studies that have examined the relationship between the HPWS, employee outcomes, service climate and customer satisfaction. Finally, the prevailing theories in the literature regarding this relationship will be presented.

Figure 2.1: Outline of Chapter 2
2.2 Agencification

2.2.1 Introduction

In recent decades, as the population has grown and economic and political crises intensify around the world, many international organisations, including the World Bank and the IMF have called on governments to introduce NPM reforms into their public sectors to cope with these challenges (Schwab, Bouckaert and Kuhlmann, 2017; Verhoest, 2017). Such reforms aim to replace traditional methods of public sector management in ways inspired by the experiences of the private sector to improve the quality of services provided and yield cost reductions (Hood, 2011; Verhoest et al., 2012). NPM reforms also aim to overcome the pressures of bureaucracy and the policies of rationalisation of public spending, which all governments have had to implement in light of increased public debt and annual budget deficits (Schwab, Bouckaert and Kuhlmann, 2017; Verhoest, 2017; Hammerschmid et al., 2018). The reduction of government control and decentralisation have been seen as pillars of that reform that can facilitate a quantum leap in the level of public services (Wettenhall and Aulich, 2009). Accordingly, the NPM doctrine, which has predominated globally since the 1980s as an approach to enhancing the quality of public services to citizens, has come to be seen as viewing clients the same way the private sector does (Roness, 2007; Verhoest et al., 2012; Hammerschmid et al., 2018). Many forms of the approach have since been developed to organise public tasks in the public sector (OECD, 2002; Pollitt et al., 2007; Verhoest et al., 2012a; Pollitt and Bouckaert, 2017). For instance, some of these forms included the transfer of a large number of public services from the government to the private sector through outsourcing, privatisation, competitive tendering and corporatisation (Schwab, Bouckaert and Kuhlmann, 2017). However, the primary trend and emphasis of NPM has been to create a leaner government with fewer large, multi-tasking organisations such as ministries and divide the tasks among a larger number of organisations, such as quasi-autonomous agencies that are granted a high degree of managerial autonomy to enable the model of a ‘business-like’ organisation in a strategy known as agencification (Bouckaert et al., 2010; Verhoest et al., 2012; Hammerschmid et al., 2018).

Nevertheless, multiplying agencies in the public sector is not a new phenomenon; what is new, particularly after 1999, is the disaggregating and hiving-off of attached departments from existing ministries and converting them into autonomous entities (Verhoest et al., 2012). Thus, agencification has ‘become a popular vehicle for executing a wide range of functions in a large number of countries’ in the last two decades (Pollitt et al., 2001, p. 272; Verhoest et al., 2012; Zahra and Jadoon, 2016). According to Verhoest (2017), the expanded managerial autonomy granted to those autonomous
entities has allowed their managers to respond quickly to user demands and changing environments, and that, in turn, has supposedly improved organisational effectiveness and efficiency (Zahra and Jadoon, 2016; Kleizen, Verhoest and Wynen, 2018). Verhoest et al., in their book Government Agencies (2012), studied and compared the practices of agencification of 30 countries around the world. They noticed that public sectors all over the world have witnessed major shifts towards favouring autonomous and the semi-autonomous entities in place of governmental ministries. Agencification has been implemented in nearly all developing—and even developed—countries (OECD, 2002). Whether the motivation to do so was a real, local pressure to improve the public services or the intense propaganda of certain international organisations, such as the World Bank, the IMF or the Organisation for Economic Co-operation and Development (OECD), or just to shift blame away from politicians, the agencification phenomenon has become widespread throughout the world (Hood, 2011; Mortensen, 2016; Verhoest, 2017; Kleizen, Verhoest and Wynen, 2018).

2.2.2 Categorisation of agencies

There is no one single type of agency; each state creates the kind of agency that is best suited to its political and economic status in terms of control, autonomy and governance arrangements (Verhoest et al., 2012; Overman and van Thiel, 2016). However, scholars of NPM have defined certain characteristics that should exist in an organisation for it to be classified as an agency. An agency should operate at arm’s length from the government and have some degree of autonomy, especially regarding managerial aspects (Pollitt et al., 2005). Recently, due to the efforts of scholars to establish a categorisation of public-sector organisations to be used later as an instrument for comparative analyses, a classification of agencies was developed by Sandra Van Thiel (2012), as shown in Table 2.1. She ranked categorisation types from zero to five. Type zero represents an entirely governmental organisation such as a ministry, which is the traditional structural type of a governmental entity; at the end of this ranking is type five, which represents an entirely private organisation that works independently without government interference (Verhoest et al., 2012). Thus, agencification ranges, according to this categorisation, from type one to type four. However, According to Verhoest et al., (2012), the most typical types for agencification are types one and two.
The type one agency is classified as a semi-autonomous organisation as it has no legal independence, although it has some managerial autonomy and is considered to be the closest type of agency to the core government (Verhoest, 2017). This type of agency is commonly referred to in the United Kingdom as a Next Step agencies; they have come to dominate the central government structure in the United Kingdom and employ nearly 50 per cent of public officials in that country (Verhoest et al., 2012). The next type is the type two agency. It is classified as an autonomous organisation with formal statutory independence and a high degree of managerial autonomy (Verhoest, 2017). The non-ministerial departments in Oman, such as the public authority for electricity and water, is an example of a type two agency. Thiel (2012) noted that the popularity of the second type of agency has declined since 1990, while the popularity of the first type has increased. This has been attributed to the desire of governments to restore their control over these agencies through the notion of ‘whole-of-government’: the second generation of reforms to address the growing economic and political challenges and the succession of global financial crises which require the integration of government efforts to face (Christensen and Lægreid 2007; Thiel 2012). However, Thiel (2012) stated at the end of her conclusion that ‘there are no indications that these new reforms have led to less agencification’. She pointed to the fact of the growing popularity of type two agencies again among governments as an indicator of the need for further research to probe the realities of this area.

Table 2.1: Categorisation of Public-Sector Organisations

<table>
<thead>
<tr>
<th>Type</th>
<th>Definition</th>
<th>Examples</th>
</tr>
</thead>
<tbody>
<tr>
<td>0</td>
<td>Unit or directorate of the national, central or federal government (not local, regional or state)</td>
<td>Ministry, department, ministerial directorate/directorate general (DG), state institution</td>
</tr>
<tr>
<td>1</td>
<td>Semi-autonomous organisation, unit or body without legal independence but with some managerial autonomy</td>
<td>Next Step agencies (UK), contract/executive agencies, state agencies.</td>
</tr>
<tr>
<td>2</td>
<td>Legally independent organisation/body (based on statutes) with managerial autonomy, either based on public law or private law</td>
<td>Public establishment, statutory bodies or authorities.</td>
</tr>
<tr>
<td>3</td>
<td>A private or private-law based organisation established by or on behalf of the government, such as a foundation or corporation, company or enterprise (the government owns a majority or all stock; otherwise Category 5)</td>
<td>Commercial companies, state-owned companies (SOC) or enterprises (SOE), and government foundations.</td>
</tr>
<tr>
<td>4</td>
<td>Execution of tasks by regional or local bodies and/or governments</td>
<td>Länder (Germany), regions (UK), states (Australasia)</td>
</tr>
<tr>
<td>5</td>
<td>Other, not listed above</td>
<td>Contracting-out to private companies and privatisation with the government owning a minority of or no stock</td>
</tr>
</tbody>
</table>

Source: (Thiel, 2012)
The main focus of the agencification process is to disaggregate large public organisations and turn them into the opposite of government bureaucracy by applying a business-like model, which represents the heart of NPM doctrine (Thiel and CRIPO team, 2009). By looking at both semi-autonomous and autonomous organisations, it can be seen that both of them have been disaggregated from a core governmental body to operate at arm’s length from the government; the main difference is that the latter is an independent legal person while the former is not. Moreover, both have been granted managerial autonomy, allowing the organisation to choose, for example, an appropriate HRM system and a financial system that best suits it in order to achieve its objectives (Pollitt et al., 2004; Thiel and CRIPO team, 2009; Zahra and Jadoon, 2016). Thus, managerial autonomy plays a vital role in transforming a traditional government entity into a market-driven entity, which leads to higher quality and efficiency as the organisation become more client- and cost-aware (Thiel and CRIPO team, 2009). Also, there is less political and hierarchical impact on daily operations compared to a typical government bureaucracy (Verhoest, 2017).

The research sample for the current study targeted two types of public-sector organisations in Oman, namely type zero and type two, based on the above classification. The 10 ministries are type zero agencies, representing ministerial departments that develop policies, plans, programs and implementation mechanisms for the public sector. They also play a significant traditional role in providing public services to citizens. The other five public authorities are autonomous organisations or type two agencies. They are non-ministerial departments established with legal independence and managerial autonomy in financial and HRM. Royal Decree No. (116/91) issuing the system of public authorities and institutions had stated that each public authority should be established by a Royal Decree, shall enjoy legal personhood as well as financial and administrative independence, shall be considered a unit of the administrative apparatus of the state and shall be subject to the supervision of the body determined by the decree of its establishment. Thus, with the objective of combining the two trends of decentralisation through the agency system and, at the same time, strengthening accountability by consolidating the role of the central government (Wettenhall and Aulich, 2009), the Omani model addresses both of these issues by allowing the establishment of agencies with legal personhood and a high degree of managerial autonomy. At the same time, the control of the central government is being tightened by the appointment of a minister or so-called ‘parent minister’ to oversee the newly created agency. Based on the classification above, Table 2.2 lists the types of governmental entities in this study and refers to the titles of the parent ministers who supervise public authorities in accordance with the royal decrees that established each body. The role of the parent minister is to ensure that work is done within the framework of the objectives and the budget.
allocated (Pollitt et al., 2005). However, the managerial autonomy granted to those public authorities gives them discretion within their allocated budgets—the current budget and the investment budget—so the intervention of the parent minister is limited in this respect (Verhoest et al., 2012). Moreover, this managerial autonomy extends to allow public bodies to choose the human resources system that best suits their needs, unlike other government ministries, which are subject to the civil service law governing the management of human resources.

<table>
<thead>
<tr>
<th>Name</th>
<th>Type</th>
<th>Parent minister</th>
</tr>
</thead>
<tbody>
<tr>
<td>Ministry of Health</td>
<td>0</td>
<td>-</td>
</tr>
<tr>
<td>Ministry of Transport and Communications</td>
<td>0</td>
<td>-</td>
</tr>
<tr>
<td>Ministry of Housing</td>
<td>0</td>
<td>-</td>
</tr>
<tr>
<td>Ministry of Social Development</td>
<td>0</td>
<td>-</td>
</tr>
<tr>
<td>Ministry of Manpower</td>
<td>0</td>
<td>-</td>
</tr>
<tr>
<td>Ministry of Education</td>
<td>0</td>
<td>-</td>
</tr>
<tr>
<td>Ministry of Commerce and Industry</td>
<td>0</td>
<td>-</td>
</tr>
<tr>
<td>Ministry of Agriculture and Fisheries</td>
<td>0</td>
<td>-</td>
</tr>
<tr>
<td>Ministry of Regional Municipalities and Water Resources</td>
<td>0</td>
<td>-</td>
</tr>
<tr>
<td>Ministry of Tourism</td>
<td>0</td>
<td>-</td>
</tr>
<tr>
<td>Public Authority for Radio and Television</td>
<td>2</td>
<td>Minister of Information</td>
</tr>
<tr>
<td>Public Authority for Electricity and Water</td>
<td>2</td>
<td>Minister Responsible for Financial Affairs</td>
</tr>
<tr>
<td>Information Technology Authority</td>
<td>2</td>
<td>Minister of Transport and Communications</td>
</tr>
<tr>
<td>The Public Authority for Consumer Protection</td>
<td>2</td>
<td>The Council of Minister</td>
</tr>
<tr>
<td>Public Authority for Craft Industries</td>
<td>2</td>
<td>Minister of Diwan of Royal Court</td>
</tr>
</tbody>
</table>

2.2.3 Impact of agencification on public sector performance

In the NPM literature, there are several arguments supporting the positive impact of agencification on the performance of the public sector (Sakdiyakorn and Voravivatana, 2015). For example, Overman and van Thiel (2016) argue that when agencification creates more single-purpose and business-like agencies, greater focus can be devoted to the needs of customers and this will ultimately narrow the gap between expected and actual service quality for users. This logic is in line with what Hood (1991) stressed regarding the enhancement of quality and efficiency via agencification. Agencification is therefore expected to contribute to enhancing professionalism and quality of service in agencies more effectively than traditional bureaucratic units (Osborne and Gaebler, 1992; Pollitt et al., 2001). The semi-autonomous and autonomous agencies are designed to have small structural sizes with specific operational objectives and focus on serving the public (Bach, 2012; Pollitt et al., 2001); thus, these agencies are closer to end users and can enhance their active participation in improving the quality of services and identifying their new needs (MacCarthaigh and Boyle, 2012; Hammerschmid et al., 2018). Further, the collapsing of the monopoly of public services through agencification will have a positive impact on performance in
the public sector by creating more units competing to improve service levels (Savas, 1987; Ostrom and Ostrom, 1971). On the political side, agencification is seen as a practical means of keeping public service providers well away from the political pressure (Mortensen, 2016). According to Verhoest et al. (2012), agencification could be used by some countries as a tool to avoid blame by politicians, fight nepotism or limit the control of political parties to specific areas of the public sector.

Despite the claims and assumptions about the positive impact of agencification pertaining to quality and performance in the public sector as discussed above, to date, there have been very few empirically based, published accounts to support these claims (Overman and van Thiel, 2016). Pollitt and Dan (2013) analysed 519 studies across Europe on the impact of NPM and found that most of them focused on its impact on internal procedures and processes, not on its effects on public service quality. Thus, the activities and processes of NPM have been given considerable emphasis rather than the impact of this reform on performance development. In practice, however, the degree of emphasis on such claims must take into account the effects of NPM as well as its operations and activities (Pollitt and Dan, 2013; Hammerschmid et al., 2018). Also, Pollitt and Dan (2013) found that the reported results were markedly mixed, which led them to conclude that ‘our understanding of the impact of NPM remains both fragmentary and fragile’. In the same vein, Overman and van Thiel (2016) conducted a systematic comparison in 20 countries to assess the impact of agencification on public sector performance. They found a negative effect on both public sector output and efficiency, which lead them to question the agencification approach as a way of meeting the challenges of financial and monetary crises. Moreover, their findings show that agencies with more funds achieved higher efficiency, which contradicts the idea that agencies are considered a solution for states to rationalise spending. In the United Kingdom, for example, after successive decades of structural reform, Hood and Dixon (2015) found that reform costs have risen over the years. This may well explain the recent trend in the West of the rationalisation of agencification (Verhoest et al., 2012). Even on the economic side, the overall results of empirical studies are not conclusive as to the extent to which agencification has had a positive effect on efficiency and effectiveness in the public sector (Verhoest, 2017). It is not surprising in this context that several scholars have agreed that although agencification has not substantiated its claims to improved performance, it has helped to at least divert the blame from the central government bureaucracy and politicians and onto those autonomous entities (Flinders, 2008; Hood, 2011; Mortensen, 2016).

Therefore, many scholars believe that the study of the impact of agencification on improving performance levels and the quality of services provided in the public sector has not received sufficient attention or documentation, so it remains unclear whether autonomous agencies have
really improved the efficiency and quality of service (Talbot, 2004; Pollitt and Talbot, 2004; Verhoest et al., 2004; Christensen and Lægreid, 2006; Verhoest et al., 2012; Hood and Dixon, 2015; Mortensen, 2016; Verhoest, 2017; Hammerschmid et al., 2018). Moreover, in their book *Government Agencies*, Verhoest et al. (2012) argue that in attempting to improve the quality of services through agencification processes, many new challenges have emerged in terms of control, accountability and integration. Agencification has complicated the management of governmental organisations in light of the expansion of their structures and independence (Bouckaert, Peters and Verhoest, 2010). Further, the presence of agencies without a ministerial representative has resulted in weakening parliamentary accountability (Flinders, 2001), leading to an increase in the number of voices calling for the restoration of central control over government organisations and in support of the idea of ‘the whole government’; in response, the post-NPM or de-agencification movement is seen as one of the best ways to lead the public sector in the context of global crises through the integration of government units rather than their fragmentation by agencification (Flinders 2001; Pollitt and Talbot, 2004; Christensen and Lægreid, 2008; Bouckaert, Peters and Verhoest, 2010; Lodge and Gill, 2011; Verhoest et al., 2012; Verhoest, 2017; Hammerschmid et al., 2018).

So, as Schick (2002) predicted, ‘one should not be surprised if integrated departments return to favour in the not too distant future’. However, as agencification is proliferating around the world thanks to positive publicity and constant promotion by international organisations such as the IMF, the World Bank and others (OECD, 2002; Verhoest et al., 2012), empirical research and studies need to be intensified to assess its impact on public sector performance. According to OECD (2002) estimates, in many countries where agencification is operating, agencies account for more than half the number of workers in the public sector and spend more than half of government spending. In Britain, for instance, Wettenhall (2005) pointed out that nearly 80 per cent of civil government institutions will find themselves in the future having become agencies, as is the case in the Netherlands, where it is estimated that these agencies will soon employ about 80 per cent of civil servants (Verhoest et al., 2012).

On the other hand, research activity has not kept up with the momentum of agencies in assessing their impact on performance; as a result, supporting scientific evidence remains rare and unconvincing (Verhoest and Lægreid, 2010; Pollitt and Dan, 2013; Overman and van Thiel, 2016). According to Verhoest et al. (2012), customer satisfaction surveys conducted in the late 1990s show that more than 80 per cent of agencies are classified as satisfactory or higher. Verhoest and her colleagues also believe that the impact of agencification on the overall efficiency of the central government is less clear and needs further study, particularly concerning central government
expenditure. There is no doubt that the continuing role played by agencification in the public sector and the challenges that arise in this regard is an essential subject for study and ongoing research (Verhoest et al., 2012). In some developing countries, for example in Pakistan, due to corruption and lack of performance-based controls, agencification has become a governance issue in recent years (Zahra and Jadoon, 2016). It is therefore very important for governments and parliaments around the world to recognize that agencification is not the panacea for all performance problems in the public sector and that other factors should be taken into account, such as the decisive role of workers and the service climate, especially in the public sector, which is primarily responsible for providing services to the public (Verhoest et al., 2012).

The general public and many parliamentarians and journalists who may be unable to distinguish between agencies and other public sector institutions and see them all as unknown ‘species’ might be surprised to know that the BBC (British Broadcasting Commission), despite its reputation, is merely one of these public agencies (Verhoest et al., 2012). Although one of the reasons for the creation of agencies has been the establishment of more user-oriented institutions (Yesilkagit and Van Thiel, 2012), unfortunately, there has been very little research examining the relationship between agencification and stakeholders, including employees and customers in particular (Verhoest et al., 2012). Blom and others (2018) also strongly recommended future research on the relationship between HRM and performance within the autonomous bodies created by NPM due to the lack of empirical studies in this area. This recommendation is shared by several other scholars (Hammerschmid et al., 2018; Farooq et al., 2018; Bezes and Jeannot, 2018). Further, there is a call to examine the effects of NPM on a range of outcomes simultaneously (Hammerschmid et al., 2018). Research should focus on comparing different groups of public organisations rather than on individual agencies. Performance assessment goes beyond efficiency and economics to other vital aspects, such as quality of services, effectiveness, responsiveness and right of equal access (Verhoest et al., 2012). Thus, the present research will expand the literature in this area by examining the moderating role of agencification in two main categories of public sector entities—government ministries (type zero) and public authorities (type two)—examining the role of managerial autonomy, particularly in HRM, in enhancing public sector performance levels. The following section will elaborate on the importance and relationship of HRM to performance in the public sector.
2.3 HRM and the Public Sector

In the previous section, the concept of agencification was discussed. NPM scholars and public-sector officials tend to advocate for improved performance in this sector by adopting the agencification process. The essence of this process is the basic idea of granting managerial autonomy to agencies, which takes two primary forms: HRM autonomy and financial management autonomy (Yesilkagit and Van Thiel, 2008; Zahra and Jadoon, 2016). In the current study, emphasis will be placed on HRM autonomy as a touchstone for independent public authorities to choose an HRM system that fits their objectives. While the rest of government ministries are subject typically to one HRM system (Hansen and Ferlie, 2016), the Omani context is shaped by civil service law, as mentioned in Chapter 1. Along the same lines, SHRM emphasises the importance of the relationships between HRM systems and other elements and components of organisations (Jiang and Messersmith, 2018). According to Jackson, Schuler and Jiang (2014), SHRM scholarship is defined as ‘the study of HRM systems (and/or subsystems) and their interrelationships with other elements comprising an organisational system, including the organisation’s external and internal environments, the multiple players who enact HRM systems, and the multiple stakeholders who evaluate the organisation’s effectiveness and determine its long-term survival’. Scholars of SHRM consider HRM systems as a source of sustainable competitive advantage (Lado and Wilson, 1994; Pfeffer, 1994; Becker and Gerhart, 1996; Boxall, 1996) since such systems are responsible for the generation and utilisation of appropriate human resources, resulting in a high level of organisational results (Delery and Roumpi, 2017). Several studies have shown how the role of staff is more central in the relationship between the HRM system and performance through the impact of this system on employee attitudes and behaviour (Guest, 2017). SHRM considers an HRM system (or bundles of HRM practices) to be a positive contributor to the performance of any firm (Wright and Boswell, 2002; Combs et al., 2006; Lawler et al., 2011; Bello-Pintado, 2015). In a similar vein, Rees (2013) attributed the decline in the performance of the public sector in many developing countries to weak HRM systems, which, in turn, lead to the inevitability of the development of these systems if public services are to be upgraded (Knies and Leisink, 2017). SHRM has only recently received attention in the literature on public administration, with several researchers expressing the belief that SHRM is increasingly important in shaping the performance of public organisations (Andrews et al., 2012; Hansen and Ferlie, 2016).

In the SHRM literature, the notion of the HRM system is commonly used interchangeably with other terms, such as HRM or high-performance work system (HPWS) (White and Bryson, 2018), although HPWS has recently become the most frequently used term in the SHRM literature to describe an
HRM system (Guest, 2017). HPWSs have been dominant in the field of SHRM and are considered to be a powerful means to improve organisational outcomes (e.g. Arthur, 1994; Huselid, 1995; Macduffie, 1995; Delery and Doty, 1996; Ichниowski, Shaw and Prennushi, 1997; Delery, 1998; Boselie, Paauwe and Jansen, 2001; Combs et al., 2006; Bowen and Ostroff, 2004; Chuang and Liao, 2010; Lin and Liu, 2016). However, the research evidence for the HPWS has been driven mainly by the private sector, despite the vital role of the public sector in providing nearly all essential services to the public from cradle to grave, as well as its role as a major national employer in many countries (Knies et al., 2018). The public sector has suffered from reduction of funds in most countries due to successive global crises and subsequent austerity programs (Wynen, Verhoest and Kleizen, 2017). At the same time, it has had to answer the calls of parliamentarians and the public to advance the level of services without exceeding the ceiling of available financial budgets. This is why officials in this sector have sought to focus on SHRM as an added-value method that has been empirically proved to be successful in the private sector and has received increasing attention from researchers in recent decades (Knies et al., 2018). Several researchers have pointed out the importance of distinguishing between the public and private sectors in terms of their respective roles (Moore, 1995; Moore, 2000; Rainey and Steinbauer, 1999). The private sector is mainly focused on financial targets that seek to maximise profits through market competition plans in the service and product sectors, while the public sector’s mission, which is primarily non-profit, is to provide services to the community or what is known as public value (Knies and Leisink, 2017; White and Bryson, 2018). The mechanism of evaluating the performance of work in each sector is different and is measured in the private sector through realised profits and in the public sector according to the public value produced (Knies and Leisink, 2017; White and Bryson, 2018). Thus, when evaluating performance in public sector institutions, the focus should be on users’ satisfaction as users are the largest target segment for public services and in order to obtain a clearer picture of the level of services provided to them (Knies and Leisink, 2017).

The present study will focus on testing the moderating role of agencification by comparing the impact of the HRM system reflected in other outcomes such as employee outcomes, service climate and customer satisfaction, which will be discussed in detail in the next sections, in two main categories of government institutions: ministries (type zero) and public authorities (type two). Accordingly, the SHRM literature will be expanded because HRM autonomy has never been seen as a major issue in the private sector (Bryson, 2004; Hansen and Ferlie, 2016). Companies are expected to have the HRM autonomy to act in a contrary manner to what happens in centralised and bureaucratic public organisations that are typically subject to civil service law (Hansen and Ferlie,
Thanks to NPM reforms, emerging agencies have been granted such HRM autonomy that they have been able to formulate their own HRM systems away from the rigidity of any policy (Pollitt et al., 2004). Concerning financial management autonomy, it was discussed in the first chapter that the general budget of the state showed an increase in the average cost of workers in the public authorities compared to ministries, indicating that this autonomy on the financial side has led to higher spending; this is in sharp contrast to the claim that is promoted of agencification as one of the means to reduce and rationalise public sector spending as explained in detail in the previous section.

### 2.3.1 High-performance work system (HPWS)

There is almost unanimous agreement on the definition of an HPWS as a multiple set of HRM practices that work together as a system that plays a crucial role in helping the organisation achieve its objectives and improve its effectiveness to be more competitive (Appelbaum et al., 2000; Datta, Guthrie and Wright, 2005; Kalleberg et al., 2006; Becker and Huselid, 2006; Bartram et al., 2007; Macky and Boxall, 2007; Stanton and Manning, 2013; Delery and Roumpi, 2017). The rationale for this association is that an HPWS is geared towards creating value, uniqueness, knowledge and skills for employees that are not readily imitated by others, which, in turn, generate better performance and competitive advantage for the organisation (Wright, Gardner and Moynihan, 2003; Zhang and Morris, 2014). However, there is no consensus on the HRM practices that compose an HPWS, and they usually vary among studies (Posthuma et al., 2013; Delery and Roumpi, 2017). Typically, an HPWS includes ‘bundles’ of practices such as staffing, training, performance appraisal, compensation, job design, and involvement and participation (e.g., Datta, Guthrie and Wright, 2005; Zacharatos, Barling and Iverson, 2005; Kalleberg et al., 2006; Macky and Boxall, 2007; Sun, Aryee and Law, 2007; Takeuchi et al., 2007; Wang and Xu, 2017; White and Bryson, 2018). Thus, when examining the HPWS, the integration of practices as a single system must be emphasised in line with the strategic or system perspective on SHRM; these practices should not be subdivided into different subgroups as many studies have done (Boon et al., 2017; Saridakis, Lai and Cooper, 2017; White and Bryson, 2018). Because the underlying idea is based on the synergy of practices of the HPWS, it would be more appropriate to examine the whole HRM system (Arthur, 1994; Delery, 1998; Huselid, 1995; MacDuffie, 1995), and when a bundle of HRM practices is used, a researcher could obtain better predictive power (Delery and Gupta, 2016). Also, the added value of the HPWS is important for studies in this area to test the relationship between the HPWS and organisational performance (Boon et al., 2017). According to Saridakis et al. (2017), who recently
compiled the results of eight longitudinal studies in this field, a set of integrated HPWS practices has a stronger impact on the company’s performance than individual HRM practices.

Recent meta-analytic reviews show that HPWSs have continuously been positively linked to employee outcomes and other operational and financial outcomes of firms (Combs et al., 2006; Jiang, Lepak, Hu, et al., 2012; Shin and Konrad, 2017). Scholars argue that advanced HR practices, known as HPWSs, high-involvement work practices, or high-commitment HR practices, help organisations achieve better performance outcomes by generating more motivated and committed employees (Datta, Guthrie and Wright, 2005; Boselie, Dietz and Boon, 2005; Cafferkey and Dundon, 2015; Shin and Konrad, 2017). Combs, Liu, Hall and Ketchen (2006), in their published work ‘How Much Do High-Performance Work Practices Matter? A Meta-Analysis of Their Effects on Organisational Performance’ described two processes effected by an HPWS to improve organisational performance: the first is improving workers’ knowledge, skills and abilities (KSAs) (Delery and Shaw, 2001), and the second is facilitating cooperation and communication among employees so that the social structure within the firm is improved (Evans and Davis, 2005). Moreover, the centralisation of employee attitudes and behaviour that mediates the relationship between an HPWS and individual performance has been demonstrated through empirical research (Mackay and Boxall, 2007; Boxall and Purcell, 2008; Stanton and Manning, 2013; Shin and Konrad, 2017). Thus, organisations ultimately gain a competitive advantage when they obtain and maintain valuable and scarce resources (Combs et al., 2006). Lin and Liu (2016) outlined some studies that offer empirical evidence regarding the impact of HPWSs on service quality and performance. Further, they showed how the organisational climate must be considered vital in the relationship between the HPWS and performance (Gelade and Ivery, 2003; Bowen and Ostroff, 2004; Liao and Chuang, 2004; Chuang and Liao, 2010).

In the present study, the researcher adopted the AMO model as a theoretical framework for selecting HPWS practices. This model reflects practices that enhance staff abilities, motivation and opportunities to contribute to organisational performance (Delery and Roumpi, 2017; Jiang and Messersmith, 2018). Following the AMO model, the HRM practices composing the HPWS in this study will include the following. (1) Ability-enhancing HRM practices that focus on increasing employee KSAs. Examples include recruitment and selection and formal training systems. (2) Motivation-enhancing practices that aim to increase employee motivation, including practices such as incentives and rewards and internal career ladders. (3) Opportunity-enhancing practices that focus on employee participation and empowerment, such as employee voice and participation and job...
rotation. The AMO model will be discussed in detail in the next section. In this section, we will discuss the reasons for including the above practices in this study to form the HPWS, as follows:

2.3.1.1 Recruitment and selection

Recruitment and selection are usually seen as one process that ultimately aims to fill the vacant position in the institution with the best person for the job, which can be obtained internally or from the labour market (Leatherbarrow and Fletcher, 2018). Most academics agree that recruiting the right people in the first place is one of the means of achieving the organisation's competitive advantage and thus reflects on raising its organisational performance (e.g. Huselid, 1995; Pfeffer, 1998, Purcell et al., 2003; Desta, 2008; Leatherbarrow and Fletcher, 2018). The HRM system should, therefore, include this practice as one of the core practices on which the organisation relies to establish competent and capable human capital. The Omani context selected for this study, as detailed in Chapter 1, presents a challenge in HRM due to societal culture, which amplifies the effects of certain factors such as tribes and family relations (Al-Jahwari and Budhwar, 2016), which may contribute to the spread of some undesirable practices in terms of recruitment and selection because of the overlap of relations, nepotism and cronyism (Budhwar et al., 2018). This practice was included to reflect the current research sample convictions about this practice in terms of the ability to overcome these obstacles by employing the best possible competencies to fill vacancies according to an objective and fair process.

2.3.1.2 Formal training systems

The formal training system is one of the most important means of increasing the skills and abilities of employees in any institution and it is positively related to organizational performance (Way, 2002; Pfeffer, 1998; Tharenou, Saks and Moore, 2007; Vlachos, 2008; Garson, 2012; Delery and Gupta, 2016). Therefore, Keep (1989) has stressed the need for training to be a vital component of any HRM system. According to Poole (2002) ‘training must be seen as an investment rather than a cost to be rationalised away’. The HRM literature in Oman has identified a gap in the skills of the labour force, the outcomes of the education system, and the demands of the labour market in Oman (Swailes, Said and Fahdi, 2012). So, this requires HRM systems to address this problem by intensifying the training aspect to enhance skills practices. According to Rajasekar and Khan (2013), the consequences of not having adequate training systems addressing the real needs of Omani public sector employees will make public institutions ‘become mired in ignorance and obsolete skills, unable to adapt to and keep pace with the changing times and technologies, a situation which would be disastrous’. Thus, this practice was included in the current HPWS study so that its contribution
to this system can be measured in influencing staff outcomes and service climate to their impact on customer satisfaction.

2.3.1.3 Performance appraisal

Performance appraisal is the process by which an employee's individual performance is evaluated over a specified period of time (DeNisi and Smith, 2014). This practice is one of the most critical practices through which an organisation can assess its employees and identify deficiencies or weaknesses in individual performance (Subramony, 2009; Noe et al., 2017). This shortcoming could be later addressed by linking the results of this appraisal to the immediate and future training needs of staff (DeNisi and Gonzalez, 2004). The results of this evaluation can also be linked to incentive and rewards systems, so the results of this appraisal could motivate the staff member to do more to improve their performance (DeNisi and Pritchard, 2006). Given the importance of this practice and the prevailing societal culture in Oman, as described in Chapter 1, this practice was included in the HPWS to ensure consistency and coherence in this system, as well as to understand how staff opinions regarding their beliefs about objectivity and integrity in performance appraisal to exclude any effects of undesirable practices in an environment work like nepotism.

2.3.1.4 Broadly defined job

The job description is widely regarded as one of the most essential practices that will enable the employee to accurately understand the requirements of his/her job and duties, which will be later the basis for evaluating the employee's performance (Daley and Vasu, 2005; Leat and El-Kot, 2007; Jiang, Lepak, Han, et al., 2012; Raineri, 2016). Although there is a slight discrepancy between the elements of this job description between institutions, in general job description is defined as ‘the document that outlines the “what” elements of the job, such as: purposes of the job; tasks involved; duties and responsibilities; performance of objectives; reporting relationships; and terms and conditions (remuneration, hours of work)’ (Robinson et al., 2016). The availability of clear and rigid job descriptions is one of the most critical characteristics of HRM systems that seek to achieve competitive advantage and high organisational performance (Chan, Shaffer and Snape, 2004). In the present study, the selection of this practice within the HPWS was taken into account to build a sound and coherent system that maximises organisational performance by ensuring that the employees have an accurate description of what is required of them, which helps overall performance improvement and later in the evaluation of that performance. There is also a gap between the supply and the demand in the Omani labour market in terms of skills, in addition to the government's orientation towards the policy of nationalisation/localisation (Budhwar et al., 2018). Thus, to overcome the dilemma of replacing skilled foreign workers with other citizens, the importance of a
clear and specific job description is reinforced to help overcome these dilemmas. In particular, these new national workers need initial support such as on-the-job training and a document such as job descriptions that enable them to understand the nature of this job in a detailed and precise manner.

2.3.1.5 Internal career ladders

This practice refers to opportunities for career advancement within the organisation and this is an important motive that encourages employees to develop their skills and abilities so that they can compete for higher jobs in the career ladder within their organisation (Sims, 2002). The results of this practice, besides its motivation effect on employees, help create a sense of commitment between staff and their organisation and provide a degree of job satisfaction with the fairness of recruitment and promotion within the organisation (Guest, 1997; Noe et al., 2017). Also, this practice helps to achieve job stability as it provides opportunities for career advancement within the organisation, thereby reducing the need for staff to seek better jobs outside the organisation (Sims, 2002). This, of course, will enable the institution to retain its human capital and avoid the efforts and expenses resulting from the loss of such assets (Noe et al., 2017). This practice was therefore included in the design of HPWS for this study in terms of its importance in achieving consistency and strength of this system, on the one hand, and on the other to take into account the societal culture in the context of this study. Some malpractices such as nepotism may overlap with the issue of internal promotions, limiting them to specific categories according to the rule of interests or personal relationships (Budhwar et al., 2018). Therefore, the existence of this practice reflects the staff’s convictions about the reliability and fairness of this practice in the institution.

2.3.1.6 Incentives and rewards

All organisations use two kinds of incentives that are important to encourage and motivate their employees to be more motivated and diligent. These incentives are divided into monetary and non-monetary incentives. Cash incentives such as salaries, profit sharing programs, bonuses, and non-monetary incentives, for example, are in the form of rewards, designation, recognition, privileges (Kazmi and Kazmi, 1986). In order to achieve the objective of the incentive system, justice and transparency must prevail (Raines, 2019). Many studies point to the importance of this system in creating a highly motivating atmosphere for employees when they see that the fruits of their efforts are compatible with rewards and appreciation, which leads them to do more (e.g. Arthur, 1994; Macduffie, 1995; Huselid, 1995; Delery and Doty, 1996; Wood, Holman and Stride, 2006; Kaufman, 2015). On the other hand, the weaker the incentive system in any institution, the more resentment and negative behaviours among employees (Davies, Hertig and Gilbride, 2015). This practice was therefore incorporated into the HPWS practices identified in this study because no
HRM system can succeed without a satisfactory and equitable incentive system (Raines, 2019). On the other hand, by incorporating this practice, this study will enable a greater understanding of staff beliefs on this practice in the context of the Omani public sector. We can observe any different influences that a culture of society may have, such as patronage and the unfairness of the incentive system.

2.3.1.7 Employee voice and participation

This practice reflects the availability of a two-way communication channel between staff and the employer and the extent to which staff participate beyond sound delivery to active participation in decision-making within the organisation (Aylott, 2018). Empowering staff and providing them with an opportunity to communicate their voice to officials within the organization at different levels and involve them in discussions and decisions will undoubtedly add value to the organization and develop a sense of commitment, trust and motivation among staff, which will positively reflect on overall corporate performance (Greenberg and Edwards, 2009; Leatherbarrow and Fletcher, 2014). In the specific Omani context of this study, the values of participation in the culture of society in the Sultanate are rooted and derive their origins from the principle of ‘shura’ in the Islamic religion (Budhwar et al., 2018), which requires that the group consult in all its affairs and to make decisions on the basis of this fundamental principle in Islamic culture (Ramdani et al., 2014). The integration of this practice into HPWS reflects an essential dimension of a component of the culture of the society in the context of the study and will demonstrate the breadth and impact of this practice in the formation of a coherent and effective HRM system.

2.3.1.8 Job rotation

Job rotation, also known as cross-training, aims at enabling the employee to learn a variety of skills within a specific department for a specific period of time in order to expand the employee's knowledge and skills, thereby enriching his/her experience and stimulating his/her learning and development (Boxall, Purcell and Wright, 2008; Ho, Chang and Shih, 2009). Exposing staff to different parts of the organisation gives them an integrated picture of the work cycle and gains a broader understanding of their role, participation and integration with other functions (Kalleberg et al., 2006). This will also help reduce some performance issues in the organisation. For example, in the absence of a particular employee, the service may be delayed unless there is an employee who can replace this absence and be able to perform this work as a result of previous job rotation in that section (Kalleberg et al., 2006). Since the context of this study is conducted within the public sector, which is a service sector, it is essential that the HRM system includes the practice of job rotation, as it is one of the means of training and the development of staff skills and capabilities. This is very
important in this sector, taking into account the need to bridge the skills gap in education outcomes in the Sultanate (Al-Jahwari and Budhwar, 2016). This practice is one way of bridging the skills gap by exposing staff and training them to work in different departments, thus enhancing their confidence and skills which will be reflected later in developing their abilities and performance.

2.3.2 Organisational performance

There are two approaches to the concept of organisational performance: the stakeholder approach, which focuses on non-financial indicators to assess organisational performance, and the shareholder approach, which focuses more on the use of financial indicators (Paauwe and Boselie, 2005). The concept of organisational performance has evolved over the years (Abu Khalaf, Hmoud and Obeidat, 2019) since it began to determine the extent to which the organisation achieved its objectives in the 1950s. In the present century, it has taken on a broader and more comprehensive dimension through the involvement of other stakeholders (Abu Khalaf, Hmoud and Obeidat, 2019). One modern definition of organisational performance is the ability of organisations to survive not only by meeting their own needs but also by meeting the needs of stakeholders (Griffin, 2003). The organisational performance definition moved a step further by adding value-added scenarios to organisational performance measurement. Antony and Bhattacharyya (2010) defined organisational performance as a measure of value created for stakeholders such as employees and clients by proper management of the organisation. Thus, the concept of the organisational performance has evolved from its narrow scope as a measure of the extent to which the organisation achieves its objectives to include a broader concept that takes into account the range of influencers and those affected by the performance of that organisation through the added value it has created for different categories of stakeholders (Masa’deh et al., 2018; Abu Khalaf, Hmoud and Obeidat, 2019). Accordingly, as Carton (2004) points out, the organisation ensures its survival only by producing a value greater than or equal to the value expected by different stakeholders.

In the SHRM literature, organisational performance has often been addressed through the context of the private sector, so the emphasis on financial measures has prevailed (Knies et al., 2018). Although measuring organisational performance through financial measures is traditional in most profit and non-profit organisations, it has been widely criticised because this type of measurement focuses on the short term and does not reflect a strategic view that focuses on more profound and more valuable indicators, for example, quality, stakeholder satisfaction and value added (Lee, 2008; Shahin, Naftchali and Pool, 2014; Abu Khalaf, Hmoud and Obeidat, 2019). There are three main categories of organisational performance that are often found in the SHRM literature (Dyer and Reeves, 1995;
employee outcomes, such as employee attitudes and behaviour; operational outcomes, such as quality and customer satisfaction; and financial outcomes, such as return on equity and return on assets (Issue and Held, 2015; Katou, 2017). Jiang, Lepak, Hu, et al. (2012) stated that the three types of organisational performance had been widely accepted as sequentially influenced by an HPWS. Accordingly, an HPWS will first affect employee outcomes as the most proximal variables, which, in turn, will affect respectively distal variables such as operational and financial outcomes (Colakoglu, Lepak and Hong, 2006; Jiang, Lepak, Hu, et al., 2012; Issue and Held, 2015; Katou, 2017). It has been shown that the HPWS is positively related to these three outcomes (employee, operational and financial outcomes) through a number of empirical studies summarised in recent meta-analytic reviews (Jiang, Lepak, Hu, et al., 2012; Rauch and Hatak, 2016; Wright and Ulrich, 2017; Saridakis, Lai and Cooper, 2017; Delery and Roumpi, 2017; Jiang and Messersmith, 2018). However, there is a belief among academics that there is too much emphasis on financial indicators that measure performance at the expense of other non-financial indicators and that our understanding of the relationship between the HPWS and organisational performance is therefore inadequate (Legge, 2001; Kaufman, 2010; Guest, 2011; Cafferkey and Dundon, 2015). Thus, more emphasis should be placed on the perspective of stakeholders as it reflects the impact of proximate variables such as employees and customers (Boselie, Dietz and Boon, 2005; Wright and Nishii, 2007). By understanding this, more significant development in this area could be achieved. According to Cafferkey and Dundon (2015), focusing solely on the perspective of shareholders, who only care about remote variables such as financial results, does not allow us to understand clearly the varied mechanisms and impacts that affect organisational results.

The debate between the use of objective (financial) or subjective (non-financial) measures to measure organisational performance and their reliability and validity are both commonly raised in the literature. Objective measurements are usually based on financial indicators such as return on equity, return on assets and Tobin’s q. These indicators are obtained either through direct disclosure by firms or through published financial reports. While non-financial or subjective indicators such as employee outcomes (employee attitudes and behaviour) and operational outcomes (quality and customer satisfaction) are collected from managers or employees based on their own convictions. Therefore, there is a widespread belief among academics that objective measurements are more reliable and valid because they are based on specific objective criteria (Singh, Darwish and Potočnik, 2016). As opposed to what might result, for example, in the second case, by managers or employees when they exaggerate or reduce organisational performance indicators (Rabl et al., 2014; Singh, Darwish and Potočnik, 2016; Rauch and Hatak, 2016). However, there is an increasing use of
subjective indicators for easy access, unlike many financial indicators, for example, which may not be disclosed in some companies or may be prepared according to different reporting and accounting standards, making them not comparable to other studies (Hult et al., 2008; Singh, Darwish and Potočnik, 2016). In their recent interesting study of four countries, Singh, Darwish and Potočnik (2016) concluded that the subjective measurements were not less reliable and valid than the objective measurements to measure organisational performance. Also, they added that ‘with careful planning, reliable subjective data on organisational performance can be collected and put to statistical rigour to test prepositions related to the organisational performance of firms’.

The public sector lacks one of the most essential traditional financial indicators of the private sector; it is usually referred to as the bottom line and relates to the increased profitability or net worth of the organisation (Boxall and Purcell, 2011; Knies et al., 2018; White and Bryson, 2018). Instead, the ultimate goal of public organisations in measuring their performance is to rely on the extent to which they perform their tasks in terms of the value they have produced for the community and the multiple stakeholders (Moore, 2000; Knies et al., 2018). Accordingly, the current study, which was conducted in the context of the public sector, is based on non-financial outcomes and responds to calls in the literature to rely more on a stakeholder approach (e.g. Knies et al., 2018; White and Bryson, 2018). Therefore, employee outcomes and customer satisfaction were used as measures of organisational performance in this study.

2.3.3 Theories linking the HPWS and organisational performance

Over the past two decades, the causal links between SHRM and performance have predominated in related academic research and practitioner debate (Purcell and Kinnie, 2008). Scholars argue that advanced HR practices known as HPWSs help organisations achieve better outcomes (Shin and Konrad, 2017). The literature search yielded two unique approaches to establishing the SHRM–organisational performance link: the best practices or universalistic approach (Pfeffer, 1994) and the best-fit approach (Schuler and Jackson, 1987; Wood, 1999). The former approach suggests that a specified set of HRM practices will always yield superior business outcomes whatever the associated circumstances—in other words, regardless of the strategy used or the industry (Paauwe and Boselie, 2005; Katou, 2009; Zhang and Morris, 2014; Katou, 2017). The latter approach suggests that HRM practices must be consistent with strategy and with the context in order to maximise performance (Paauwe and Boselie, 2005; Zhang and Morris, 2014; Katou, 2017).

Jiang and Messersmith (2018), in their recent meta-review of SHRM, identified more than 20 theories or theoretical perspectives used by researchers to explain the relationship between SHRM
and organisational performance, which is often referred to as the black box (Boselie et al., 2005; Issue and Held, 2015). The most widely used theories are the resource-based view (RBV), the ability-motivation-opportunity (AMO) framework, and social exchange theory. These theories and theoretical perspectives attempt to rationalise the mechanism of influence of the HPWS on the various components of organisational performance and the pathways of that effect, which most researchers believe begin with the variables nearest the HPWS, namely the employee outcomes, which, in turn, affect distal variables such as operational and financial outcomes (Colakoglu, Lepak and Hong, 2006; Jiang, Lepak, Hu, et al., 2012; Issue and Held, 2015; Katou, 2017). The latest meta-analytical reviews of a large number of empirical studies show the positive association of the HPWS with organisational performance (Jiang, Lepak, Hu, et al., 2012; Rauch and Hatak, 2016; Wright and Ulrich, 2017; Saridakis, Lai and Cooper, 2017; Delery and Roumpi, 2017; Jiang and Messersmith, 2018). The current study adopted these three theories to explain why and how the theoretical model to research HPWSs is associated with the related outcomes, as will be discussed in detail in the next sections.

2.3.3.1 The resource-based view

The resource-based view (RBV) argues that valuable, rare, inimitable and non-substitutable resources can serve as potential sources of sustainable competitive advantage for firms (Penrose, 1959; Wernerfelt, 1984; Barney, 1991). This theoretical framework is considered one of the most popular in management literature (Delery and Roumpi, 2017; Jiang and Messersmith, 2018). Saridakis, Lai and Cooper (2017), in their recently published meta-analysis of longitudinal studies exploring the relationship between HRM and firm performance, found much support for the RBV framework in the SHRM literature. They, along with other academics (Barney, 1986; Rumelt, 1984), have recognised that the characteristics of companies that are costly for others to imitate, such as HPWSs and human capital resources, are a source of economic rents and serve as fuel and catalysts for increased performance and competitive advantage. Paauwe and Boselie (2005) consider the HPWS to be an extension of the RBV. Consequently, from this perspective, investing in an HPWS is an enhancement of the organisation’s performance (Wright, Dunford and Snell, 2001; Shin and Konrad, 2017). The HPWS, for example, contains the ambiguity and social complexities that competitors find difficult to imitate (Becker and Huselid, 1998; Boon et al., 2017). It is also used to develop and maintain valuable human resources, ultimately leading to increased organisational performance (Jiang, Lepak, Hu, et al., 2012; Boon et al., 2017). According to White and Bryson (2018), the integration of HPWS practices into enterprise operations enables the creation of a
managerial resource that subsequently yields performance outcomes. Also, several academics have pointed out that human capital resources necessitate HPWS practices that can leverage and create this resource to achieve a sustainable competitive advantage (Wright and McMahan, 2011; Nyberg et al., 2014; Delery and Roumpi, 2017; Saridakis, Lai and Cooper, 2017).

The current study adopted the RBV as a theoretical framework to explain the relationship between the HPWS and organisational performance. Based on the RBV, SHRM considers HRM systems such as HPWSs as a source of competitive advantage. The previous sections discussed the agencification process and how it focused on HRM autonomy, which ensures that the public authorities have the freedom to choose the appropriate HRM system as one of the most critical tools for reforming and developing performance in the public sector. The public authorities have been granted the advantage of autonomy to formulate their own HRM system, while the ministries remain subject to a unified HRM system (the Civil Service Act). Hansen and Ferlie (2016) argue that the application of the RBV to study the field of NPM would be fruitful, as this reform essentially claims to transform government organisations and make them more competitive. Accordingly, this study will expand the literature of the two fields of NPM and the SHRM. It proposes, according to the RBV, that the HPWS in both cases will be a source of competitive advantage by positively influencing employee outcomes, service climate and customer satisfaction. The study also seeks to know the difference in the influence of the two HRM systems via suggesting that agencification will moderate the influence of the HPWS on other variables under study.

2.3.3.2 Ability–motivation–opportunity model

One of the most extensive models used to study the mechanism of the linkage between the HRM and performance is the ability–motivation–opportunity (AMO) model (Boselie et al., 2005). According to Appelbaum et al. (2000), HRM systems will enhance the performance of employees and their individual contributions via stimulating their ability, motivation, and opportunity to participate and perform. The AMO model, therefore, refers to three crucial elements that affect staff performance—staff ability, motivation and opportunity to perform—and proposes that HRM systems can be linked to organisational performance through their impact on these three components (Becker and Huselid, 1998; Delery and Shaw, 2001; Guest, 1997; Lepak et al., 2006b; Gerhart, 2007; Jiang, Lepak, Hu, et al., 2012; Jiang, Takeuchi and Lepak, 2013; Wang and Xu, 2017; Boon et al., 2017; Guest, 2017; Delery and Roumpi, 2017; Shin and Konrad, 2017; Jiang and Messersmith, 2018). Researchers have empirically proved that the bundles of HRM practices aimed at enhancing employees’ abilities, motivation and opportunities to perform are more effective in influencing
performance outcomes than isolated HRM practices (Knies and Leisink, 2017; White and Bryson, 2018). Therefore, in order to create an effective HRM system, its practices must be integrated into three areas: skill-enhancing practices, motivation-enhancing practices and opportunity-enhancing practices (Lepak et al., 2006; Gardner, Wright and Moynihan, 2011; Katou, 2017; White and Bryson, 2018). According to Delery and Roumpi (2017), researchers have usually operationalised the AMO model in two ways: on the one hand, they have used it to justify the perspective that human capital is a potential source of competitive advantage if its abilities are developed, stimulated and allowed to participate; on the other hand, other teams of researchers argue that the HRM system is itself a potential source of competitive advantage if it aims to integrate appropriate practices that enhance skills and abilities, motivate staff and allow them to participate within the organisation (Blom et al., 2018). In other words, when the organisation creates and uses an HPWS through a set of practices that generate and emulate the AMO model, it will contribute to the enhancement of employee outcomes and ultimately contribute to improved organisational performance (White and Bryson, 2018). According to Delery and Roumpi (2017), the acquisition of a competitive advantage indeed requires the interaction of an HPWS and human capital resources.

There is no consensus in the SHRM literature on the HRM practices that form or should be included under the HPWS umbrella; however, the AMO model appears to be the common link between the various proposed groups of practices (Boselie, Dietz and Boon, 2005; Kepes and Delery, 2007; Kehoe and Wright, 2013; Delery and Roumpi, 2017; Saridakis, Lai and Cooper, 2017; White and Bryson, 2018; Jiang and Messersmith, 2018). The AMO model is focused on the individual level of analysis when examining the impact of HRM practices (Appelbaum et al., 2000; Boselie, Dietz and Boon, 2005; Blom et al., 2018). Boselie (2010) hinted that the intentions of the organisation would be interpreted by employees from the HRM practices adopted by the organisation. Following the AMO model, the HRM practices composing the HPWS in this study will include the following. (1) Ability-enhancing HRM practices that focus on increasing employee KSAs. Examples include recruitment and selection and formal training systems. (2) Motivation-enhancing practices that aim to increase employee motivation, including practices such as incentives and rewards and internal career ladders. (3) Opportunity-enhancing practices that focus on employee participation and empowerment, such as employee voice and participation and job rotation. Also, emphasis should be placed on integrating the three sets of practices as a single system in line with a strategic or systemic perspective rather than divided into three different subgroups, as many studies have done (Boon et al., 2017; Saridakis, Lai and Cooper, 2017; White and Bryson, 2018). Thus, this study proposes that when an HPWS is designed to integrate—(1) practices that enhance capacity, (2) practices that
promote motivation and (3) practices to enhance staff participation—it will positively enhance employee outcomes and increase their skills and abilities, motivate them to show positive attitudes and behaviours that will positively reflect on their performance and will contribute to improving the service climate and achieving customer satisfaction.

2.3.3.3 Social exchange theory

Scholars describe employment contracts as one of two types (Aryee, Budhwar and Chen, 2002; Snape and Redman, 2010): a written contract that clearly defines contractual obligations between the parties or a social contract that is not written in specific terms. The basic criterion of the second type of contract depends on the degree of positive or negative feeling felt by employees towards their institutions as a result of what these institutions do and which will, in the end, be translated according to the reciprocity rule by employees into positive or negative behaviour that can improve or weaken individual and institutional performance (Aryee, Budhwar and Chen, 2002; Snape and Redman, 2010). According to Jiang and Messersmith (2018), many researchers have sought to rely on the theory of social exchange to understand the mechanism and role of staff attitudes and behaviours in the relationship between HRM systems and organisational performance. This theory is based on the norm of reciprocity and social exchange relationships of Gouldner (1960) and Blau (1964), respectively. They suggest in a simplified way that each action entails a reaction in the sense that employees can feel it when their organisation is interested in investing in them by developing their skills and abilities and devising ways to motivate them. On their part, employees will appreciate this and tend to reciprocate by showing a lot of positive attitudes and behaviours. This creates a reciprocal relationship between workers and employers that contributes to enhancing organisational performance (Takeuchi et al., 2007; Messersmith et al., 2011; Jiang and Messersmith, 2018). When workers see equality throughout their organisation, they will work in a mutually beneficial manner according to the theory of social exchange (Blau, 1964; Aryee, Budhwar and Chen, 2002). Thus, a series of useful exchanges begins when one party benefits another, stimulating the receiving party to reciprocate, which results in a shared sense of commitment and obligation between the parties that leads to further such exchanges in the future (Coyle-Shapiro and Shore, 2007; Visser, 2015).

Several studies have demonstrated the link between HRM systems applied in the workplace and the attitudes and behaviours of staff (Snape and Redman, 2010; White and Bryson, 2018). The researchers attributed this to the fact that when implementing an HRM system such as an HPWS, the aim is to develop and equip employees with skills and abilities, motivate them and allow them to participate effectively at work (Blom et al., 2018). The organisation sends positive messages and
signals to employees that they are the focus of attention and interest of the organisation. As a result, employees have positive perceptions and insights towards the institution, prompting them to demonstrate at least a similar amount in return through commitment and positive attitudes and behaviour (Kuvaas, 2008; Snape and Redman, 2010). The relationship between the two parties builds trust and commitment and develops motivation and satisfaction among employees, thereby enhancing positive attitudes and behaviours that emerge as a kind of reciprocal response to the employer’s interest and as a form of appreciation by employees (Saridakis, Lai and Cooper, 2017). Thus, based on the theory of social exchange and through an HPWS designed according to the AMO model in the current study, it is expected that by enhancing the staff’s ability, motivation and opportunity to do their work, they will make increasing efforts, which, in turn, should lead to a higher level of performance. Also, the theoretical model is expected to produce interaction based on the theory of social exchange to create and enhance the service climate. Given the positive impact of the HPWS and its positive relationship to employee attitudes and behaviours, staff perceptions will foster positive service climate development in a mutual process with the organisation. Thus, customer satisfaction is expected to be achieved in two ways: first, by promoting positive outcomes among employees, and second, by spreading and enhancing a favourable service climate. Thus, drawing on social exchange theory, this study proposes that as an ultimate result, an HPWS can positively influence employee outcomes, service climate and customer satisfaction.

2.4 Linking HPWS and Employee Outcomes

The link between the HPWS and various performance outcomes has been frequently demonstrated in the field of SHRM (Kloutsiniotis and Mihail, 2018). However, the mechanism by which HPWSs impact performance remains a gap in the literature: the so-called ‘black box’ (Takeuchi et al., 2007; Messersmith et al., 2011; Kloutsiniotis and Mihail, 2018 ). Many scholars have called for a focus on the intervening mechanisms that could expand our understanding of how this impact happens (Innocenti, Pilati and Peluso, 2011; Van De Voorde and Beijer, 2015; Kloutsiniotis and Mihail, 2018). One of the most important aspects in expanding our understanding about how the HPWS affects other outcomes is the role of the individual employee and related outcomes, such as employee attitudes and behaviours (Jiang, Takeuchi and Lepak, 2013; Chang and Chen, 2011; Chuang and Liao, 2010; Takeuchi, Chen and Lepak, 2009). The macro-level perspective, which been widely adopted in SHRM studies, has been criticised for ignoring employees’ perceptions of the HPWS (Nishii and Wright, 2008; Purcell and Hutchinson, 2007; Jiang et al., 2013). Therefore, the focus has recently shifted to the micro-level perspective to include individual perceptions of the HPWS.
and examine the mediating role of employee outcomes as a key to open the ‘black box’ (Jiang, Takeuchi and Lepak, 2013; Kehoe and Wright, 2013; García-Chas, Neira-Fontela and Castro-Casal, 2014).

Many studies have highlighted that positive employee outcomes such as job satisfaction, organisational commitment, trust, motivation and intention to remain lead to increased levels of operational and financial performance (Appelbaum et al., 2000; Steijn, 2004; Collins, Ericksen and Allen, 2005; Katou and Budhwar, 2006; Katou and Budhwar, 2010; Zhang and Morris, 2014). However, researchers have commonly focused on only one or two employee outcomes. In this study, a combined set of five employee outcomes will be included simultaneously as a unit in order to examine their mediation role in the relation between the HPWS and customer satisfaction.

In the next section, each of the five employee outcomes is briefly discussed, and the major studies that have examined their relationships with the HPWS are presented. An evaluation of these studies is presented at the end of this section.

### 2.4.1 HPWS and job satisfaction

#### 2.4.1.1 Job satisfaction

Job satisfaction has received widespread attention from researchers and professionals in recent decades (Saari and Judge, 2004; Vilela, González and Ferrín, 2008); many studies have shown that job satisfaction is vital for organisations as it has a positive impact on a number of variables related to individual and organisational performance (Spector, 1997; Park et al., 2003; Nimalathasan and Lanka, 2010; Messersmith et al., 2011; Zhang and Morris, 2014; Gould-Williams et al., 2014; Vermeeren, Kuipers and Steijn, 2014). Consequently, if an organisation has more satisfied employees, that will increase opportunities to also create more satisfied customers (Ahmed and Rafiq, 2003; Vilela et al., 2008).

Rainey (2009) saw job satisfaction as a complex construct consisting of many aspects that overlap and intersect with a large number of variables at the individual and institutional levels. Smith, Kendall and Hulin (1969) defined it as an emotional response of employees towards their jobs and workplaces, their welfare, their colleagues and their managers. McPhee and Townsend (1992) defined job satisfaction as ‘a pleasurable or positive emotional state, resulting from the perception of one’s job as fulfilling or allowing the fulfilment of one’s important job values, providing these values are compatible with one’s physical and psychological needs’ (Kumari and Thapliyal, 2017). Spector (1997), in his book *Job Satisfaction: Application, Assessment, Causes, and Consequences,*
wrote that job satisfaction is represented by how much people like or dislike their jobs. He further pointed out that measuring job satisfaction takes two forms: the global approach and the facet approach. The former approach seeks to identify the extent of job satisfaction in general and its impact on other variables, while the latter approach seeks to discover the causes of that satisfaction or lack thereof (such as with supervision, pay, and job conditions). Therefore, this research will assess job satisfaction using the global approach as the focus will be on the impact of employees’ perceptions of their job on other variables of interest.

2.4.1.2 Studies linking the HPWS and job satisfaction

Katou (2017), in her study of 996 Greek employees working in 108 private organisations, found that an HRM system had a positive impact on job satisfaction. Using a sample of 671 professionals in the Egyptian health and higher education sectors, Mostafa and Gould-Williams (2014) found that high-performance HR practices had a positive relationship with job satisfaction. Zhang and Morris (2014) found that HPWSs had a positive relationship with job satisfaction, based on a sample of 168 firms in China. Fabi, Lacoursière and Raymond (2015) found, in their study of 730 employees from different Canadian organisations, that HPWSs had a positive relationship with job satisfaction.

In the United Kingdom, Gould-Williams (2003) found that among local government employees, HRM practices had a significant positive effect on satisfaction. In New Zealand, Edgar and Geare (2005) found that HRM practices had a significant positive association with employees’ job satisfaction. Using SEM, Innocenti, Pilati and Peluso (2011) found that HRM practices in Italy had a positive effect on work satisfaction. Also, in high-tech companies in Taiwan, Yang (2006) found that HRM practices had significant positive effects on employees’ satisfaction. Den Hartog et al. (2013) found that HRM practices had significant positive relationships with employee satisfaction in their study of employees and line managers of a Dutch restaurant chain.

Guest (2001) found, in his study based on 1,200 British private-sector establishments, that increasing the use of HR practices had a positive association with employee satisfaction. Harmon et al. (2003) found that a high-involvement work system was associated with employee satisfaction in 146 Veterans Health Administration centres in the United States. Katou and Budhwar (2006) studied 178 organisations in the Greek manufacturing sector and found that HRM systems positively affected employee satisfaction; the relationship between the HRM system and organisational performance was found to be mediated through the HRM outcomes. Steijn (2004) found that HRM
practices in the Dutch public sector had an indirect positive effect on the job satisfaction of employees, also finding that job and organisational characteristics mediated this relationship.

Messersmith et al. (2011) found, in their study of 1,755 Welsh public sector employees, that an HPWS had a significant positive relationship with job satisfaction. Wood et al. (2012) found, in their study of 22,451 employees in the private and public sectors in the United Kingdom, that high involvement in HRM practices was negatively related to job satisfaction. Vermeeren, Kuipers and Steijn (2014) found that HRM practices had a significant positive association with job satisfaction in a study of 6,253 employees of Dutch municipalities, further discovering that job satisfaction acted as a mediating variable in the relationship between HRM and organisational performance. Park et al. (2003) found that HRM systems had a significant positive effect on job satisfaction in 52 Japanese multinational corporation subsidiaries operating in Russia and the United States.

2.4.2 HPWS and organisational commitment

2.4.2.1 Organisational commitment

In a recent study, Uraon (2018) noticed that organisational commitment had attracted not only scholars but also the full attention of professionals. Also, Choi, Oh and Colbert (2015), in their meta-analytic study to understand organisational commitment, concluded that researchers and practitioners must focus on the commitment aspect as the committed employee is considered to be a vital asset to any organisation. It has thus been argued that a highly committed employee is more eager to fulfil the goals of the organisation (Farndale, Hope-Hailey and Kelliher, 2011; Guest, 1987).

In that vein, Gong et al. (2009) encourage organisations to seek and retain employees with the characteristic of commitment as they are more likely to exhibit positive behaviour, such as lower lateness rates and less absenteeism, and are linked with many positive outcomes that influence job variables, as mentioned by Choi, Oh and Colbert (2015), such as job performance (Uraon, 2018; Cooper-Hakim and Viswesvaran, 2005; Meyer et al., 2002; Riketta, 2002).

Meyer and Allen (1991, 1997) identified three dimensions of organisational commitment: affective, normative, and continuance commitment. Affective commitment denotes the employee’s emotional attachment to the firm, while normative commitment represents the individual’s sense of obligation to remain with the organisation, and continuance commitment denotes the individual’s estimate of the cost of leaving the employer. Studies have shown that the three forms of commitment increased retention of employees and tied them to the organisation, with affective commitment considered to be most strongly related to job performance (Meyer et al., 2012). The most significant component
of organisational commitment, which has become popular and widely used in academia due to its impact on performance, is affective commitment (Uraon, 2018; Allen and Meyer, 1990). In the current study, affective commitment was adopted as a measure of organisational commitment because its robust connection with organisational commitment has been proved by many studies (Uraon, 2018; Nieves and Osorio, 2017; Fabi, Lacoursière and Raymond, 2015; Dhar, 2015; Chang and Chen, 2011).

2.4.2.2 Studies linking HPWS and commitment

Zhang and Morris (2014) found that HPWSs had a positive relationship with employee commitment, based on a sample of 168 firms in China. Ramdani et al. (2014) studied 81 Algerian firms and found that HPWSs are positively associated with organisational commitment, although this effect is not converted into organisational-level outcomes. Fabi, Lacoursière and Raymond (2015) found, in their study of 730 employees from different Canadian organisations, that HPWSs had a positive relationship with organisational commitment. In a study of 351 small businesses in the United States, Rogg and colleagues (2001) found that HR practices were significantly related to employee commitment. Guest (2001) found, in his study based on 1,200 British private-sector establishments, that an increased use of HRM practices had a positive association with employee commitment. In a study involving 191 local government employees in the United Kingdom, Gould-Williams (2003) found that HRM practices had a positive relationship with organisational commitment. Katou and Budhwar’ (2006) study of 178 organisations in the Greek manufacturing sector revealed that HRM systems positively affected employee commitment, while the relationship between HRM systems and organisational performance was mediated through the HRM outcomes. In a study based on 463 firms operating in China, Gong et al. (2009) found that a performance-oriented HRM system had a positive relationship with firm performance, concluding that the relationship was mediated by middle managers’ affective commitment to the firm.

Messersmith et al. (2011) found, in their study of 1,755 Welsh public sector employees, that the HPWS had significant positive effects on employee organisational commitment. Chang and Chen (2011) found that the HPWS had a significant positive relationship with employee affective commitment in 97 hair salon shops in Taiwan. Kehoe and Wright (2013) found that perceived high-performance HR practices had significant positive relationships with employee affective commitment in the United States. Dhar (2015) found that the HPWS had a positive relationship with organisational commitment, using a sample of 618 employees from 31 hotels in India.
In New Zealand, Macky and Boxall (2007) found that the HPWS had a significant positive effect on organisational commitment. Farndale, Hope-Hailey and Kelliher (2011) found, in British organisations, that high commitment performance management had a significant positive effect on employee commitment. Kwon, Bae and Lawler (2010) found, in East Asia, that high-commitment HR practices had significant positive effects on affective organisational commitment. Gould-Williams et al. (2014) found, in British local government, that high-commitment HR practices had significant positive effects on employees’ affective commitment. Agarwala (2003) found that the perceived high commitment HR practices had significant positive associations with organisational commitment amongst employees in India. Park et al. (2003) found that HRM systems had a significant positive effect on organisational commitment in 52 Japanese multinational corporation subsidiaries operating in Russia and the United States. Paul and Anantharaman (2004) found, in a sample of software professionals in India, that HRM practices had significant positive effects on organisational commitment.

2.4.3 HPWS and Trust

2.4.3.1 Trust

Searle (2013) stated, in the *Handbook of Advances in Trust Research* (p. 10), that ‘trust and HRM is an exciting and underdeveloped arena for study and a key context in which important lessons can be passed on to organisations’. However, Gould-Williams (2003) noticed with others that trust does not operationalise in HRM studies, notwithstanding its increasingly recognised role in enhancing organisational performance (Beer et al., 1985; Guest, 1987,1997; Hendry and Pettigrew, 1990). García-Chas, Neira-Fontela and Castro-Casal (2014) pointed out that the impact of trust is highlighted by staff interaction with HR practices during which employees’ attitudes and behaviours are shaped (Guzzo and Noonan, 1994, p. 453). This thread was picked up by Gould-Williams (2003) to emphasise that the element of trust, when it exists, is one of the most important elements necessary to achieve competitive advantage via inimitable human capital, as Barney’s resource-based view proposed. When employees trust their employer, they tend to put in more positive efforts and not think of leaving the organisation in contrast to those who lack that same degree of trust (Kloutsiniotis and Mihail, 2018). Moreover, Chathoth et al. (2007) asserted that academics considered trust a critical element in achieving organisational performance and noted that the predominant way of capturing trust in this field is based on employer perceptions. The present study will add to existing HRM literature by capturing trust based on the perceptions of employees themselves.
Trust has many definitions (Farndale, Hope-Hailey and Kelliher, 2011). Rousseau et al. (1998) defined trust as ‘a psychological state comprising the intention to accept vulnerability based upon positive expectations of the intentions or behaviours of another’. Innocenti, Pilati and Peluso (2011) described it as ‘the perception or belief by employees that their employers and colleagues will act upon their words’. Emmitt (2016) defined it as ‘a firm belief in the reliability of a person or a thing, an attitude held by the truster towards the trustee’. Lewicki and Wiethoff (2006) asserted that trust is ‘an individual’s belief in, and willingness to act on the basis of, the words, actions, and decisions of another’.

In this study, Luhmann’s (1979) view of trust is adopted. He differentiated between two forms comprised by the concept of trust: distinct interpersonal and system components. The first represents the level of trust among employees, while the second represents the level of trust between workers and their employers. Thus, as the focus of the current study is on the impact of the HPWS and its role in influencing the employee outcomes, the trust construct adopted will reflect the second facet of capturing trust; Farndale, Hope-Hailey and Kelliher (2011) stated that ‘employee trust in senior management is interpreted through the company’s policies and practices’. Across the SHRM literature, HPWS adoption has been proposed as leverage to enhance trust in organisations (Macky and Boxall, 2007; Kloutsiniotis and Mihail, 2018).

**2.4.3.2 Studies linking HPWS and trust**

Despite the importance of trust in the study of the relationship between the HPWS and organisational performance, few studies have examined this variable. Gould-Williams (2003) found that HR practices had a significant positive effect on the trust of local government employees in the United Kingdom. Zacharatos, Barling and Iverson (2005) found that the HPWS had a significant positive relationship with trust in two Canadian organisations from the telecommunications and petroleum industries. Orlitzky and Frenkel’s (2005) study based on 2,001 Australian workplaces revealed that the HPWS displays strong mediating linkages with trust. Tzafrir (2005) found that an HRM system had a positive effect on trust in a study based on 104 designated companies in the Israeli private sector. Macky and Boxall (2007) found that the HPWS had a significant positive relationship with trust in management in their study of employees in New Zealand. Kundu and Gahlawat (2016) found that the HPWS had a positive relationship with trust in a sample of 563 employees from 204 organisations operating in India.
2.4.4 HPWS and motivation

2.4.4.1 Motivation

Lockwood (2010) stated that ‘motivation is at the heart of performance, essential for success for both the organisation and its workforce, as a group and as individuals’. Dar et al. (2014) emphasised that no firm could establish performance synergy without satisfied and motivated employees. Therefore, the goals of the organisation would be attained when employees’ behaviour is directed by the force of motivation (Kinicki and Kreitner, 2006; Jones, George and Hill, 2008). Bowen and Radhakrishna (1991) related the process of employee motivation to willpower; that is, the employee has to enhance and direct his or her actions and behaviour towards the attainment of the organisational goal. In their book *Work Motivation*, Kanfer and colleagues (2008, p. 5) defined work motivation as ‘a psychological process that influences how personal effort and resources are allocated to actions pertaining to work, including the direction, intensity, and persistence of these actions’. Pinder (1998) defined work motivation as ‘the set of internal and external forces that initiate work-related behaviour and determine its form, direction, intensity and duration’ (Ambrose and Kulik, 1999; Park et al., 2003). The motivation in an organisation represents a real opportunity to sharpen the energies and guide employees towards achieving the set goals and to raise the levels of organisational performance (Kanfer, Chen and Pritchard, 2008).

Organisations usually use HPWSs to play a role in endorsing the motivation of employees (Park et al., 2003; Fey et al., 2009). Thus, the current study adopted the overall motivation of employees as a measure of the extent to which motivation contributes via employee outcomes to other variables of interest.

2.4.4.2 Studies linking HPWS and motivation

Despite the importance of employee motivation in the study of the relationship between the HPWS and organisational performance, few studies have examined this variable. Katou and Budhwar (2006), who studied 178 organisations in the Greek manufacturing sector and found that HRM systems positively affect employee motivation. The relationship between HRM systems and organisational performance was mediated through the HRM outcomes. Ramdani et al. (2014) studied 81 Algerian firms and found that the HPWS was positively associated with motivation; however, this effect was not converted into organisational-level outcomes. Park et al. (2003) found that HRM systems had a significant positive effect on employee motivation in 52 Japanese multinational corporation subsidiaries operating in Russia and the United States. Katou (2017), in her study of 996 Greek employees working in 108 private organisations, found that HRM systems...
had a positive impact on employee motivation. Kundu and Gahlawat (2016) found that the HPWS had a positive relationship with motivation in a sample of 563 employees from 204 organisations operating in India.

2.4.5 HPWS and intention to remain

2.4.5.1 Intention to remain

Liu and Liu (2016), along with many other academics, define intention to stay as the hidden ideas or decisions of employees about their willingness to stay in their institutions. Earlier studies suggest that the promotion of this intention among staff reduces the chances of wasting money and effort in finding replacement staff. Also, organisations where the intention to stay is high will enjoy a staff that is more focused on development and progress within the institution, ultimately resulting in positive results for individual and organisational performance and vice versa. Therefore, contemporary organisations consider retention of employees a strategic issue because they depend on them to develop and keep their competitive advantage (Wright et al., 2001; Hausknecht and Trevor, 2011; Fabi, Lacoursière and Raymond, 2015).

While the intention to remain does not measure an exact behavioural outcome, it offers a reliable measure that checks the extent to which the staff member is inclined to give up his or her job (Kehoe and Wright, 2013). According to Steel and Ovalle (1984), behavioural intentions and actual turnover are strongly associated. Several studies have found that HPWSs play a significant role in lowering turnover rate as well increasing retention rate (Way, 2002; Boon et al., 2011; Kehoe and Wright, 2013; Kundu and Gahlawat, 2016).

2.4.5.2 Studies linking HPWS and intention to remain

In their study of the Greek manufacturing sector, Katou and Budhwar (2010) found that HRM systems had a significant positive effect on employees’ intention to stay. Gould-Williams (2007) found that some HRM practices, such as training and development and equitable rewards, exhibited a significant negative relationship with intention to quit in his study of 3,165 local government workers in the United Kingdom. Using regression analyses for their study of 313 civil servants in Eritrea, Tessema and Soeters (2006) found that HRM practices had a significant positive relationship with intention to stay. Using SEM analysis, Chew and Chan (2008) found that HRM practices had significant positive effects on employee intentions to stay in Australian organisations.
Batt and Colvin (2011) studied customer service centres in the United States over five years and found that organisations using high-involvement work practices had lower rates of quits, dismissals, and total turnover, which, in turn, led to higher rates of customer satisfaction. Thus, high-involvement work organisations are associated with significantly lower quits and dismissal rates and establishments with higher quits and dismissal rates have significantly lower customer service (Batt and Colvin, 2011).

2.4.6 Evaluation of studies linking HPWS and employee outcomes

There is variation regarding the sample characteristics of all the studies presented in this section. Also, cross-sectional design, quantitative methodology and the use of surveys to collect data were predominant amongst these researchers. Regarding the analysis tools used to test the primary hypotheses, regression analysis was mostly used, and a few used SEM analysis. As noted by several meta-analysis studies in this field (e.g. Saridakis, Lai and Cooper, 2017; Blom et al., 2018), the private sector dominates most research contexts. In addition to that, developed countries, and in particular, Western countries such as the United States, the United Kingdom, the Netherlands, Australia and New Zealand, have been the location for most studies, although some studies have been conducted in non-Western countries such as China, Japan and India. In sum, these studies suggest that the use of HPWSs is positively related to employee outcomes as represented by job satisfaction, organisational commitment, trust, motivation and intention to remain.

2.5 Linking HPWS and Service Climate

Researchers’ efforts to study the ‘black box’ governing the relationship between the HPWS and organisational performance were discussed in previous sections. Such research has recently shed light on the service climate as one of the potential variables that may affect and be influenced by this relationship (Lin and Liu, 2016). There is still uncertainty about this role because it has not been fully tested (Gould-Williams, 2007; Boxall and Purcell, 2008; Cafferkey and Dundon, 2015; Lin and Liu, 2016). Schneider, White, and Paul (1998, p. 151) defined service climate as ‘employee perceptions of the practices, procedures, and behaviours that get rewarded, supported, and expected with regard to customer service and customer service quality’. Bowen and Ostroff (2004) put forward the most persuasive argument that illustrates how the HPWS affects service climate. They suggest that organisations use the HPWS as a signalling system to send messages to their employees about service delivery and what is expected, encouraged and rewarded by the organisation for the purpose of achieving customer satisfaction. There is accumulated research evidence that HPWSs
have a positive impact on the service climate and thus on customer satisfaction (Hong et al., 2013; Michel, Kavanagh and Tracey, 2013). When an HPWS improves employee capabilities, motivates them and enables them to perform, their overall performance will be improved by the creation of desirable positive behaviours which, in turn, will promote positive convictions about the service climate that will ultimately enhance the firm’s profitability (Dyer and Reeves, 1995; Keoh and Wright, 2010; Hong et al., 2013; Michel, Kavanagh and Tracey, 2013). In related literature, researchers have usually conceptualised service climate at two different levels: individual and collective (Zhang et al., 2011). The service climate is typically referred to as a psychological service climate at the individual level. James (1982) argued that the best perceptions of the service climate are captured at the individual level because they represent the perceptions of the working individuals themselves (Michel, Kavanagh and Tracey, 2013). According to Burke, Borucki and Hurley (1992), the individual’s psychological service climate is what shapes the atmosphere or the climate of the service at a collective level. Consequently, it is crucial to study the impact of staff perceptions of this climate at the individual level and its association with their perceptions of the HPWS in order to foster the emergence of a positive service climate in the organisation (Lepak et al., 2006; Cafferkey and Dundon, 2015; Subramony and Pugh, 2015; Wang and Xu, 2017). For employees who are in contact with customers, a positive service climate is important because it ensures that customer expectations are met by the provided service (Schneider and White, 2004; Michel, Kavanagh and Tracey, 2013). Moreover, the positive relationship between service climate and organisational performance indicators, including customer satisfaction, customer service quality and financial performance, have been empirically demonstrated (Schneider, White and Paul, 1998; Dean, 2004; Bowen and Ostroff, 2004; Zacharatos, Barling and Iverson, 2005; Salanova, Agut and Peiró, 2005; Bowen and Pugh, 2009; Schneider, Macey, Barbera, et al., 2009; Auh et al., 2011; Bowen and Schneider, 2014; Visser, 2015; Lin and Liu, 2016; Gabler et al., 2018).

Hong, Liao, Hu and Jiang (2013), in their meta-analytic review of the antecedents, consequences, and moderators of service climate, which included only studies at the collective level, proposed a theoretical model of service climate in organisations. This theoretical model presented the service climate’s antecedents and consequences at the collective level. The service climate was portrayed in this model on the basis of a shared collective environment that contributes, after being formed through HRM practices and leadership, to a direct impact on employee outcomes, which, in turn, is translated into customer outcomes and affects the financial performance of the organisation. This argument is based on the likelihood that employees will provide excellent service, which is linked to their perception that doing so is something expected, desired and rewarded by the employer (Liao
and Chuang, 2004; He, Li and Lai, 2011). However, it is arguable that even if it is known to employees that the provision of excellent service is ‘expected, desired and rewarded’ by the employer, the staff will not show any interaction regarding this aspect nor contribute to improving service levels. In this case, their lack of motivation, job satisfaction or trust in management and other employee-related outcomes could be a reason for not interacting or providing quality service despite the existence of a positive service climate in the organisation. Bowen and Schneider (2014), in their published article ‘A Service Climate Synthesis and Future Research Agenda’, emphasise the important role of employee engagement as a foundational base of the service climate. They argue that ‘a service climate most likely can exist when the employees in an organisation are engaged in their work’. This is logical and visible as we cannot expect the employee to actively interact with the service climate if this employee lacks this kind of interaction in his or her work-related outcomes; in other words, you can’t give what you don’t have. Therefore, we must first engage this employee through HRM systems and stimulate positive outcomes, which will affect the role of the service climate in the organisation on the individual and collective levels. Schneider, Macey, Barbera, et al. (2009) encouraged all organisations to start engaging their workers if they do not want to lose their customers and market share. There are many empirical studies that demonstrate the impact of employee engagement on service climate (Salanova, Agut and Peiró, 2005; Zhang et al., 2011; Towler, Lezotte and Burke, 2011; Veloso et al., 2015). Returning to the concept of employee engagement, several academics identify it as positive behaviours as well as attitudes that improve organisational results (Mone and London, 2010; Anitha, 2014; Abu Khalaf, Hmoud and Obeidat, 2019). It is also marked by the commitment of staff and their willingness to make more positive discretionary efforts at work (Albdour and Altarawneh, 2014; Abu Khalaf, Hmoud and Obeidat, 2019). According to Macey and Schneider (2008), among the critical elements of employee participation are motivation, commitment and trust. Saks (2006) believes that for engagement to impact firm performance, it must initially impact outcomes at the individual level because this construct is an individual-level construct. Therefore, he proposed a model that includes the antecedents and consequences of employee engagement that succeeded in predicting employee outcomes such as job satisfaction, organisational commitment and intention to quit. Employee engagement, according to many researchers, has positive consequences for organisations, including individual results such as employee outcomes (Kahn, 1990; Maslach, Schaufeli and Leiter, 2001; Harter, Schmidt and Hayes, 2002; May, Gilson and Harter, 2004; Saks, 2006; Albrecht et al., 2015). Thus, engaged employees are more likely to show more positive intentions and attitudes towards their firms (Saks, 2006). In this study, we selected the role of consequences of employee engagement proposed by Saks (2006), which views employee outcomes as antecedents of service climate. This
is in line with Bowen and Schneider’s (2014) arguments regarding the role of employee engagement and its consequences in enhancing service climate.

The recent meta-analyses and syntheses of both Hong et al. (2013) and Bowen and Schneider (2014) recognise the crucial importance of employee attitudes and behaviours as mediators between the HPWS and customer satisfaction. Further, Conway and Briner (2015) reminded academics of the need to ‘more precisely specify proximal mediators between employee attitudes and customer satisfaction’. Bowen and Schneider (2014) synthesised theories and research on the topic of service climate and proposed a broad agenda for future research which they believe is attractive to both professionals and researchers as a great deal of empirical research affirms that service climate is linked to service quality and customer satisfaction, which, in turn, yields positive outcomes for the organisation (Bowen and Pugh, 2009; Dean, 2004; Schneider, Macey, Lee, et al., 2009). They further recommended that future research should focus on understanding the individual and contextual attributes that are essential for creating a service climate. This call is in line with the call of Zhang et al. (2011) to practitioners and theorists to focus more attention on the factors related to individuals in this field because service climate works mainly through the interaction of employees with their service environment and the degree of their understanding and expectations of that process, whether negative or positive. Therefore, this study represents a reaction to the above-mentioned calls and expands the literature in this field by focusing on the mediating role of employee outcomes on the relationship between the HPWS and service climate. As mentioned above, researchers have most often conceptualised service climate at two different levels: individual and collective (Zhang et al., 2011). A service climate is typically referred to as a psychological service climate at the individual level; thus, the present study has adopted the concept of individual service climate. However, for the sake of brevity, in the present study, this climate will be referred to as service climate only. To date, few studies have tried to address the relationship between the HPWS and service climate (Rogg et al., 2001; Gahan and Buttigieg, 2008; Heffernan et al., 2016). Thus, the current study represents an expansion of the literature in this regard.

2.5.1 Studies linking HPWS and service climate directly

Zerbe, Dobni and Harel (2009) found that perceptions of HRM practices had a direct effect on service culture in a study of airline service employees in the United States. Veld, Paauwe and Boselie (2010) found that HR practices were positively related to climate for quality, using data from 576 employees working at 59 wards in a hospital in the Netherlands. In a Taiwanese context, Tang and
Tang (2012) found, in their field study of 1,133 frontline employees and 119 HR managers from 119 hotels, that high-performance HR practices had a positive relationship with service climate. Using a sample of 142 managers and 569 employees in Chinese footwear retail stores, Jiang, Chuang and Chiao (2015) found that service-oriented HPWSs had a strong positive influence on service climate. They further found that service climate mediated the relationship between HPWSs and service performance. Lin and Liu (2016) found, in their study of 203 food-service chain stores in Taiwan, that skill- and motivation-enhancing HPWSs had a positive relationship with service climate, further finding that service climate mediated the relationship between the HPWS and perceived organisational service performance.

2.5.2 Studies linking HPWS and service climate indirectly via employee outcomes

Although the role of employee outcomes is vital in studying the relationship between the HPWS and service climate, few studies have examined this role. Vigoda-Gadot and Meiri (2008) found that employee outcomes (job satisfaction and organisational commitment) had a positive impact on service climate, based on a survey of 205 employees in the Israeli public sector. Yavas, Babakus and Ashill (2010) found that management commitment was significantly related to service climate at a major retail bank in New Zealand, based on a sample of 530 employees and 576 customers. Veloso et al. (2015) found that commitment had a positive relationship with service climate among workers in 374 companies in the Brazilian market. In 114 service units in Spain (56 restaurants and 58 hotels), Salanova et al. (2005) found that the relationship between organisational resources (HR subsystem: organisational training, job autonomy) and service climate was fully mediated by work engagement (employee outcomes: vigour, dedication and absorption). Also, they found no direct relationship between organisational resources and service climate.

2.5.3 Evaluation of studies linking HPWS and service climate

There is variation regarding the sample characteristics of the studies presented in this section. Also, cross-sectional design, quantitative methodology and the use of surveys to collect data predominate amongst these studies. Regarding the analysis tools to test the primary hypotheses, regression analysis was mostly used, although for a few, SEM analysis was used. The private sector dominates the research contexts. Besides that, developed countries and, in particular, Western countries such as the United States, Spain, New Zealand and the Netherlands were the location for most studies, although some studies were conducted in non-Western countries such as China, Taiwan and Brazil.
In sum, these studies suggest that the use of HPWSs is positively related to service climate directly and indirectly via employee outcomes.

2.6 Linking HPWS and Customer Satisfaction

Delivering high-quality services which, in turn, result in customer satisfaction is vital to creating and maintaining a competitive advantage in the present era of intense competition (Cho et al., 2013; Chowdhary and Prakash, 2007; Chatzoglou et al., 2014). Empirical studies have demonstrated that customer satisfaction affects organisational performance (Mittal and Kamakura, 2001; Nagar and Rajan, 2005; Lee, Lee and Kang, 2012). Oliver (1981) suggested, in his study of customer satisfaction in the service industry, that clients perceived satisfaction as a result of subjective comparisons between their expectations and perceptions. When a firm delivers service quality that meets or exceeds customers’ expectations, possible results include customer satisfaction and loyalty (Izogo and Ogba, 2015). Also, some researchers asserted that even more customer satisfaction could be achieved by employees just meeting customers’ needs without the need to exceed their expectations (Rust et al., 1999; Gabler et al., 2018).

Scholars have conceptualised two types of customer satisfaction: transaction-specific satisfaction and cumulative satisfaction (Woodside, Frey and Daly, 1989). The former represents satisfaction with a one-time service, and the latter represents the accumulated satisfaction of multiple uses of the same service or product over time, which ultimately leads to consumer loyalty (Meesala and Paul, 2018). Accordingly, customer satisfaction should be dealt with as a monitor that lets organisations know if they are on the right path or if there is anything wrong and in need of correction (Zairi, 2000). Many academics argue that engagement of satisfied employees leads to service quality and, in turn, to customer satisfaction (Hartline and Ferrell, 1996; Hallowell, 1996; Ennis and Harrington, 2001; Babakus, Bienstock and Van Scotter, 2004; Yee, Yeung and Cheng, 2008; Lee, Lee and Kang, 2012). Thus, the role of the HPWS in influencing the staff and service climate of the organisation is vital and should lead, through its positive outcomes, to increased quality of service and thus customer satisfaction (Tsaur and Lin, 2004; Bowen and Pugh, 2009; Schneider, Macey, Lee, et al., 2009; Chand, 2010; He, Li and Lai, 2011; Kloutsiniotis and Mihail, 2018). In addition, studies show that service climate could have long-term effects on customer satisfaction, which make it vital to the organisation (Mckay et al., 2011; Gabler et al., 2018). In the current study, customer satisfaction was operationalised as transaction-specific satisfaction. Thus, the overall satisfaction of end users was adapted to capture customer satisfaction as it is classified amongst the most precise measures of customer satisfaction (Szymanski and Henard, 2001; He, Li and Lai, 2011).
2.6.1 Studies linking HPWS and customer satisfaction directly

In a study of 351 small businesses in the United States, Rogg and colleagues (2001) found that the direct effect was nonsignificant and near zero between the HRM system and customer satisfaction. A study of Baluch, Salge and Piening (2013) of 167 acute hospital trusts in the English National Health Service revealed a positive relationship between employees’ perceptions of HRM systems and patient satisfaction. Wood, Holman and Stride (2006) found that HRM systems had strong links with customer satisfaction in 145 UK call centres. Zhang and Morris (2014) found that HPWSs had a positive relationship with the satisfaction of customers, based on a sample of 168 firms in China.

2.6.2 Studies linking HPWS and customer satisfaction indirectly

2.6.2.1 Studies showing the role of employee outcomes

In a study of 351 small businesses in the United States, Rogg and colleagues (2001) found that the HRM system-customer satisfaction relationship was mediated by employee commitment. Guest (2001) found, in his study based on 1,200 British private-sector establishments, that increased use of HRM practices had significant indirect effects on service quality via employee attitudes of satisfaction and commitment. Liao and Chuang (2004) found that HRM systems had a significant indirect association with customer satisfaction via employee service performance in 25 American restaurants. Over five years, Batt and Colvin (2011) studied American customer service centres, finding that institutions using high-involvement work practices had lower rates of dismissals, quits, and total turnover, which, in turn, led to higher rates of customer satisfaction. Baluch, Salge and Piening (2013) studied 167 acute hospital trusts in the English National Health Service and found that attitudinal and behavioural HRM outcomes mediated the relationship between employees’ perceptions of HRM systems and patient satisfaction. Zhang and Morris (2014) found that employee outcomes (job satisfaction and employee commitment) positively mediated the relationship between HPWSs and satisfaction of customers, based on a sample of 168 firms in China. Khatri, Gupta and Varma (2017) found that the proactive behaviours of healthcare workers mediated the relationship between HRM and quality of patient care.

2.6.2.2 Studies showing the role of service climate

Mayer, Ehrhart and Schneider (2009) found that service climate had a positive link with customer satisfaction using a sample of 129 supermarkets in the United States. Martínez-Tur et al. (2011) found that there was an independent and significant link from service climate to customer satisfaction in 105 Spanish hotels. Using data collected from 303 workers at an Australian hotel,
Kralj and Solnet (2010) found that service climate was highly correlated with customer satisfaction. Rogg et al. (2001) found that HRM practices were mediated by organisational climate in relationship with customer satisfaction in a sample of 385 franchise dealerships. Lin and Liu (2016) found, in their study of 203 food-service chain stores in Taiwan, that skill- and motivation-enhancing HPWSs had a positive relationship with the service climate. They also found that service climate mediated the relationship between HPWSs and perceived organisational service performance. Using a sample of 142 managers and 569 employees in Chinese footwear retail stores, Jiang, Chuang and Chiao (2015) found that service-oriented HPWSs had a strong positive influence on service climate, also finding that service climate mediated the relationship between HPWS and service performance.

### 2.6.3 Evaluation of studies linking HPWS and customer satisfaction

There is variation regarding the sample characteristics for the studies presented in this section. Also, cross-sectional design, quantitative methodology and the use of surveys to collect data are predominant amongst these researchers. Regarding the analysis tools used to test the primary hypotheses, regression analysis was mostly used, although for a few, SEM analysis was used. The private sector dominates the research contexts. Further, developed countries, in particular, Western countries such as the United States, the United Kingdom and France, are the location for most studies, although some studies were conducted in non-Western countries such as China, South Korea and India. In sum, these studies suggest that the use of HPWSs is related to customer satisfaction directly and indirectly. Employee outcomes and service climate mediate the indirect relationship between HPWSs and customer satisfaction.

### 2.7 Summary

To summarise, the claims of NPM are based on improving quality of service and thus achieving customer satisfaction and improving the efficiency of the public sector, although evidence of these claims is still insufficient or incomplete. On the other hand, one of the most critical elements from which NPM derives its strength is the autonomy it gives to organisations to set up their HRM system. SHRM intersects with the view of NPM regarding HRM systems. SHRM believes that by creating a coherent and harmonious HRM system, the objectives of the organisation can be achieved by stimulating positive employee outcomes, which will improve organisational outcomes, service quality and customer satisfaction. In line with that, customer satisfaction research also recognises the vital role of the HRM system, which has been assumed to directly or indirectly create a service
climate via the development of workers’ perceptions about service delivery and what is expected, encouraged and rewarded by the organisation for achieving customer satisfaction.

Thus, this research aims to link the previous cross-cutting points via studying the impact of HRM systems on employee outcomes and service climate as well as the direct and indirect relationship between them and customer satisfaction among the ministerial and non-ministerial departments in the public sector in the Sultanate of Oman to discover the differences resulting from the effect of agencification. In the next chapter, the development of the theoretical framework of this study will be explained.
3.1 Introduction

Based on the review of the literature discussed in the previous chapter, this chapter aims to explain the approach used in this research to develop the theoretical framework and the hypotheses in three sections, as shown in Figure 3.1.

Figure 3.1: Outline of Chapter 3
3.2 Approach of the Present Research

The approach of the present research is based on a selected set of HRM practices that constitute an HRM system or so-called HPWS, which is expected to have a positive impact on organisational performance. As discussed in detail in the previous chapter, there is no consensus on the HRM practices that comprise an HPWS (Posthuma et al., 2013; Delery and Roumpi, 2017). Accordingly, the present study adopts the AMO model as a theoretical framework for selecting HPWS practices. According to Appelbaum et al. (2000), HRM systems will enhance the performance of employees and their individual contributions via stimulating their ability, motivation, and opportunity to participate and perform. The AMO model, therefore, refers to three crucial elements that affect staff performance—staff ability, motivation and opportunity to perform—and proposes that HRM systems can be linked to organisational performance through their impact on these three components (Becker and Huselid, 1998; Delery and Shaw, 2001; Guest, 1997; Lepak et al., 2006b; Gerhart, 2007; Jiang, Lepak, Hu, et al., 2012; Jiang, Takeuchi and Lepak, 2013; Wang and Xu, 2017; Boon et al., 2017; Guest, 2017; Delery and Roumpi, 2017; Shin and Konrad, 2017; Jiang and Messersmith, 2018). Researchers have empirically proved that the bundles of HRM practices aimed at enhancing employees’ abilities, motivation and opportunities to perform are more effective in influencing performance outcomes than isolated HRM practices (Knies and Leisink, 2017; White and Bryson, 2018). Thus, when the organisation creates and uses an HPWS through a set of practices that generate and emulate the AMO model, it will contribute to the enhancement of employee outcomes and ultimately contribute to improved organisational performance (White and Bryson, 2018). For that reason, the HPWSs in the current study were divided into the following groups of practices: (1) practices that enhance abilities, such as recruitment and selection and formal training systems, (2) practices that promote motivation, such as incentives and rewards and internal career ladders, and (3) practices that enhance staff participation, such as employee voice and participation and job rotation.

Regarding organisational performance, the current study employed non-financial outcomes and responds to literature calling for greater reliance on a stakeholder-focused approach (e.g. Knies et al., 2018; White and Bryson, 2018), as discussed in detail in the previous chapter. Therefore, employee outcomes and customer satisfaction were used as measures of organisational performance in this study. Many studies have highlighted that positive employee outcomes such as job satisfaction, organisational commitment, trust, motivation and intention to remain lead to increase levels of operational and financial performance (Appelbaum et al., 2000; Steijn, 2004; Collins, Ericksen and Allen, 2005; Katou and Budwar, 2006, 2010; Zhang and Morris, 2014). Thus, the
employee outcomes in the current study will be measured in terms of job satisfaction, commitment, trust, motivation and intention to remain, in order to study the different faces of this construct simultaneously, following the recommendation of Mostafa and Gould-Williams (2014). In addition, the current research employed employee outcomes and service climate as mediating variables to test the indirect relationship between HPWSs and customer satisfaction. There is accumulated research evidence that an HPWS has a positive impact on the service climate via its impact on employees (Dyer and Reeves, 1995; Kehoe and Wright, 2010; Hong et al., 2013). The study also did not neglect the consideration of the effects of societal culture in the specific context of this research (the Omani public sector), as explained in Chapter 1. A range of influences associated with religion, tribe and family play an essential role in shaping the philosophy of HRM in the Sultanate, as pointed out by a group of researchers (Al-Hamadi, Budhwar and Shipton, 2007). In addition to the policy of Omanization (i.e. replace foreign staff with skilled and qualified national workers) and the policy of reconciling the requirements of globalisation and the Omani societal culture (Al-Jahwari and Budhwar, 2016).

In short, the theoretical framework of this study was developed to fill several gaps in previous literature to enhance our understanding of the mechanism by which HPWSs affects customer satisfaction in the following ways:

1. by assessing how an HPWS based on the selection of AMO-based HRM practices affects organisational performance in a different context;
2. by using more proximal variables, such as employee outcomes and service climate, simultaneously to examine this relationship between the HPWS and customer satisfaction (Issue and Held, 2015; Lin and Liu, 2016);
3. by using non-financial outcomes to measure organisational performance (employee outcomes and customer satisfaction) to respond to calls in the literature to rely more on a stakeholder-centric approach that takes in consideration the view of other stakeholders, such as employees and customers (e.g. Knies et al., 2018; White and Bryson, 2018);
4. by focusing on staff attitudes and behaviours (employee outcomes) as one of the most relevant variables targeted by the HPWS and by using social exchange theory to understand the mechanism and the role of staff attitudes and behaviours in the relationship between the HPWS and customer satisfaction (Jiang and Messersmith, 2018);
5. by expanding the literature by considering the role of service climate in the HPWS-customer satisfaction link and contributing to our understanding of the ‘black box’ based on the argument of Bowen and Ostroff (2004);
6. by contributing to the literature of SHRM as well as to the literature of NPM by examining the HPWS-customer satisfaction link and the moderating role of agencification on two main categories of public sector entities, namely government ministries and public authorities; and
7. by empirically testing the relationship between the HPWS and customer satisfaction in a different context from that of most previous studies in terms of sector and geographical area to consider the validity of previous findings.

3.3 Theoretical Framework and Hypothesis Development

This section deals with the method used to develop the theoretical framework and the hypotheses related to this research. This method relies on linking the literature reviewed in the previous chapter with the research questions in Chapter 1. The central question of this research is about the mechanism by which perceptions of an HPWS affects customer satisfaction in the public sector. For a deeper understanding of the relationship between the HPWS and customer satisfaction, the central research question will be divided into sub-questions addressing the three main axes that shape this relationship: direct relationships, indirect relationships or mediation effects and the moderating role of agencification.

3.3.1 Direct relationships in the HPWS-customer satisfaction link

This section concerns the direct relationships within the HPWS-customer satisfaction link. The main research question pertaining to this direct relationship is ‘What is the relationship between employee perceptions of the HPWS and employee outcomes, service climate and customer satisfaction?’. The focus here is on the direct relationships that occur between the independent variable—in this case, the HPWS—and the rest of the dependent variables: employee outcomes, service climate and customer satisfaction. According to the RBV theory, as discussed in detail in the previous chapter, HPWSs are considered a source of competitive advantage that positively influence employee outcomes, service climate and customer satisfaction. Paauwe and Boselie (2005) consider the HPWS to be an extension of the RBV. Consequently, investing in an HPWS is an enhancement of the organisation’s performance (Wright, Dunford and Snell, 2001; Shin and Konrad, 2017). The rationale for this association is that the HPWS is geared towards creating value, uniqueness, knowledge and skills for employees that are not readily imitated by others, which, in turn, generate better performance and competitive advantage for the organisation (Wright, Gardner and Moynihan, 2003; Zhang and Morris, 2014). Combs, Liu, Hall and Ketchen (2006), described two processes
affected by an HPWS to improve organisational performance: the first is improving workers’ knowledge, skills and abilities (KSAs) (Delery and Shaw, 2001), and the second is facilitating cooperation and communication among employees so that the social structure within the firm is improved (Evans and Davis, 2005). Recent meta-analytic reviews show that HPWSs have continuously been positively linked to employee outcomes (Combs et al., 2006; Jiang, Lepak, Hu, et al., 2012; Shin and Konrad, 2017). Scholars argue that HPWSs help organisations achieve better performance outcomes by generating more motivated and committed employees (Datta, Guthrie and Wright, 2005; Boselie, Dietz and Boon, 2005; Cafferkey and Dundon, 2015; Shin and Konrad, 2017). When the organisation creates and uses an HPWS through a set of practices that generate and emulate the AMO model, it will contribute to the enhancement of employee outcomes (White and Bryson, 2018). It is expected that the HPWS will work through the AMO model, to motivate staff, build their capacity, equip them with skills and open the prospect of participation in decision making within their organisations. This is expected to be reflected positively on employee satisfaction, commitment and trust in the organisation to enhance their positive motivation towards achieving the organisation’s objectives. Thus, developing the intention to continue within the institution as long as it provided them with opportunities for development, motivation and participation. Accordingly, the present study proposes the following hypothesis.

**Hypothesis 1a:** The HPWS is positively related to employee outcomes.

On the other hand, just as the HPWS has a positive impact on employee outcomes, there is a growing literature on its decisive role in enhancing the service climate in the organisation (Gould-Williams, 2007; Boxall and Purcell, 2008; Cafferkey and Dundon, 2015; Lin and Liu, 2016). Bowen and Ostroff (2004) put forward the most persuasive argument that illustrates how the HPWS affects service climate. They suggest that organisations use the HPWS as a signalling system to send messages to their employees about service delivery and what is expected, encouraged and rewarded by the organisation for the purpose of achieving customer satisfaction. There is accumulated research evidence that HPWSs have a positive impact on the service climate and thus on customer satisfaction (Hong et al., 2013; Michel, Kavanagh and Tracey, 2013). Accordingly, based on the argument of Bowen and Ostroff (2004), the present study proposes the following hypothesis.

**Hypothesis 1b:** The HPWS is positively related to service climate.
As stated in the last chapter, there are three main categories of organisational performance that are often found in the SHRM literature (Dyer and Reeves, 1995; Huselid, 1995): employee outcomes, such as employee attitudes and behaviour; operational outcomes, such as quality and customer satisfaction; and financial outcomes, such as return on equity and return on assets (Issue and Held, 2015; Katou, 2017). It has been shown that the HPWS is positively related to these three outcomes (employee, operational and financial outcomes) through a number of empirical studies summarised in recent meta-analytic reviews (Jiang, Lepak, Hu, et al., 2012; Rauch and Hatak, 2016; Wright and Ulrich, 2017; Saridakis, Lai and Cooper, 2017; Delery and Roumpi, 2017; Jiang and Messersmith, 2018). However, there is a belief among academics that there is too much emphasis on financial indicators that measure performance at the expense of other non-financial indicators and that our understanding of the relationship between the HPWS and organisational performance is, therefore, inadequate (Legge, 2001; Kaufman, 2010; Guest, 2011; Cafferkey and Dundon, 2015). Thus, more emphasis should be placed on the perspective of stakeholders as it reflects the impact of proximate variables such as employees and customers (Boselie, Dietz and Boon, 2005; Wright and Nishii, 2007). By understanding this, a more critical development can be achieved in this area, which may allow us to understand the different mechanisms and effects that affect organisational outcomes (Cafferkey and Dundon, 2015). There are two ways to study the relationship between HPWS and organisational performance: first on the premise of a direct relationship between HPWS and organisational performance, which means that the effect gets directly without the need for any other intermediaries. The second approach relies on the assumption that the relationship between HPWS and organisational performance is an indirect relationship, that is, for example, the compatibility between strategy and context is required with HPWS, and there may be a role for some intermediate variables in this relationship. The former approach is referred to as the best practices or universalistic approach (Pfeffer, 1994), while the second is referred to as the best-fit approach (Schuler and Jackson, 1987; Wood, 1999). In this study, non-financial indicators (employee outcomes and customer satisfaction) were emphasized in response to the call in the literature mentioned above. Moreover, the public sector context in which this study is conducted lacks a number of financial indicators such as return on equity and return on assets, which are usually used to measure organizational performance in the private sector (Boxall and Purcell, 2011; Knies et al., 2018; White and Bryson, 2018). So, based on the universalistic approach, we expect HPWS to have a direct impact on enhancing customer satisfaction; thus we suggest the following hypothesis.

**Hypothesis 1c:** The HPWS is positively related to customer satisfaction.
When an HPWS improves employee capabilities, motivates them and enables them to perform, their overall performance will be improved by the creation of desirable positive behaviours which, in turn, will promote positive convictions about the service climate that will ultimately enhance the firm’s profitability (Dyer and Reeves, 1995; Kehoe and Wright, 2010; Hong et al., 2013; Michel, Kavanagh and Tracey, 2013). Bowen and Schneider (2014), emphasise the critical role of employee engagement as a foundational base of the service climate. They argue that ‘a service climate most likely can exist when the employees in an organisation are engaged in their work’. Schneider, Macey, Barbera, et al. (2009) encouraged all organisations to start engaging their workers if they do not want to lose their customers and market share. Many empirical studies demonstrate the impact of employee engagement on service climate (Salanova, Agut and Peiró, 2005; Zhang et al., 2011; Towler, Lezotte and Burke, 2011; Veloso et al., 2015). The engaged employees are more likely to show more positive intentions and attitudes towards their firms. Thus, in line with Bowen and Schneider’s (2014) arguments regarding the role of employee engagement and its consequences in enhancing service climate, the present study suggests the following hypothesis.

**Hypothesis 2a:** Employee outcomes are positively related to service climate.

Given the positive impact of HPWSs and its positive relationship with staff attitudes and behaviour, customer satisfaction is expected to be achieved by enhancing positive employee outcomes. According to the theory of social exchange, employees will appreciate the institution investing in them through the use of the HPWS. Moreover, thus, will exchange for this investment by showing a higher number of positive attitudes and behaviours, which are an essential means to achieve customer satisfaction. When a customer connects with an employee who has a great deal of positive attitude in his behaviour, he will probably make the most effort to achieve customer satisfaction by providing a high-quality service. Thus, the reciprocal relationship between workers and employers will contribute to enhancing organisational performance (Takeuchi et al., 2007; Messersmith et al., 2011; Jiang and Messersmith, 2018). Many academics argue that engagement of satisfied employees leads to service quality and, in turn, to customer satisfaction (Hartline and Ferrell, 1996; Hallowell, 1996; Ennis and Harrington, 2001; Babakus, Bienstock and Van Scutter, 2004; Yee, Yeung and Cheng, 2008; Lee, Lee and Kang, 2012). Accordingly, using social exchange theory, this study proposes the following hypotheses:

**Hypothesis 2b:** Employee outcomes are positively related to customer satisfaction.
For employees who are in contact with customers, a positive service climate is important because it ensures that customer expectations are met by the provided service (Schneider and White, 2004; Michel, Kavanagh and Tracey, 2013). So, as the HPWS has contributed to the strengthening of the service climate in the organisation by sending messages to employees about service delivery and what is expected, encouraged and rewarded by the organisation to achieve customer satisfaction as proposed by Bowen and Ostroff (2004). The positive relationship between service climate and organisational performance indicators, including customer satisfaction, customer service quality and financial performance, have been empirically demonstrated (Schneider, White and Paul, 1998; Dean, 2004; Bowen and Ostroff, 2004; Zacharatos, Barling and Iverson, 2005; Salanova, Agut and Peiró, 2005; Bowen and Pugh, 2009; Schneider, Macey, Barbera, et al., 2009; Auh et al., 2011; Bowen and Schneider, 2014; Visser, 2015; Lin and Liu, 2016; Gabler et al., 2018). There are many evidence in the literature that shows that HPWSs have a positive impact on the service climate and thus on customer satisfaction (Hong et al., 2013; Michel, Kavanagh and Tracey, 2013). When the service climate is present in the organisation, the probability of achieving customer satisfaction is high. Accordingly, based on the argument of Bowen and Ostroff (2004), the present study suggests the following hypothesis.

**Hypothesis 3:** Service climate is positively related to customer satisfaction.

### 3.3.2 The mediation effects in the HPWS-customer satisfaction link

This section concerns the mediating roles of employee outcomes and service climate on the relationship between perceptions of an HPWS and customer satisfaction by addressing the following question ‘To what extent do employee outcomes and service climate mediate the relationship between the HPWS and customer satisfaction?’.

The organisational performance measured in the current study by employee outcomes and customer satisfaction. Jiang, Lepak, Hu, et al. (2012) stated that those two types of organisational performance had been widely accepted as sequentially influenced by an HPWS. Accordingly, an HPWS will first affect employee outcomes as the most proximal variables, which, in turn, will affect respectively distal variables such as customer satisfaction (Colakoglu, Lepak and Hong, 2006; Jiang, Lepak, Hu, et al., 2012; Issue and Held, 2015; Katou, 2017). It has been shown that the HPWS is positively related to these two variables through a number of empirical studies summarised in recent meta-analytic reviews (Jiang, Lepak, Hu, et al., 2012; Rauch and Hatak, 2016; Wright and Ulrich, 2017; Saridakis, Lai and Cooper, 2017; Delery and Roumpi, 2017; Jiang and Messersmith, 2018). Also, as discussed in detail in the last chapter, the centralisation of employee attitudes and behaviour that mediate the relationship between the HPWS and individual performance has been demonstrated
through empirical research (Mackay and Boxall, 2007; Boxall and Purcell, 2008; Stanton and Manning, 2013; Shin and Konrad, 2017). The recent meta-analyses and syntheses of both Hong et al. (2013) and Bowen and Schneider (2014) recognise the crucial importance of employee attitudes and behaviour as mediators between the HPWS and customer satisfaction. Thus, based on the theory of social exchange, this study assumes that employee outcomes will play an intermediate role in the relationship between HPWS and customer satisfaction. When employees perceive the organization's keenness to invest in them through the use of the HPWS, which aims to develop their capabilities and encourage them to participate within the organization, in a reciprocal relationship according to the above theory they will begin to show positive attitudes and behaviour that will eventually enhance customer satisfaction in the enterprise. Accordingly, the present study proposes the following hypothesis.

**Hypothesis 4a:** Employee outcomes mediate the relationship between the HPWS and customer satisfaction.

Bowen and Schneider (2014) recommended that future research should focus on understanding the individual and contextual attributes that are essential for creating a service climate. This call is in line with the call of Zhang et al. (2011) to practitioners and theorists to focus more attention on the factors related to individuals in this field because service climate works mainly through the interaction of employees with their service environment and the degree of their understanding and expectations of that process, whether negative or positive. Therefore, this study represents a reaction to the calls as mentioned earlier and expands the literature in this field by focusing on the mediating role of employee outcomes on the relationship between the HPWS and service climate. When an HPWS improves employee capabilities, motivates them and enables them to perform, their overall performance will be improved by the creation of desirable positive behaviours which, in turn, will promote positive convictions about the service climate that will ultimately enhance the firm’s profitability (Dyer and Reeves, 1995; Kehoe and Wright, 2010; Hong et al., 2013; Michel, Kavanagh and Tracey, 2013). Thus, based on the theory of social exchange, this study assumes that employee outcomes will play the role of mediator in the relationship between HPWS and the service climate. The reciprocal relationship between the staff and the institution per the theory above will make employees show more positive attitudes and behaviour that will enhance the service climate within the institution. Accordingly, the present study proposes the following hypothesis.

**Hypothesis 4b:** Employee outcomes mediate the relationship between the HPWS and service climate.
Researchers’ efforts to study the ‘black box’ governing the relationship between the HPWS and organisational performance were discussed in the previous chapter. Such research has recently shed light on the service climate as one of the potential variables that may affect and be influenced by this relationship (Lin and Liu, 2016). There is still uncertainty about this role because it has not been fully tested (Gould-Williams, 2007; Boxall and Purcell, 2008; Cafferkey and Dundon, 2015; Lin and Liu, 2016). Further, Lin and Liu (2016) showed how service climate in the organisation is considered vital to the relationship between the HPWS and performance (Gelade and Ivery, 2003; Bowen and Ostroff, 2004; Liao and Chuang, 2004; Chuang and Liao, 2010). Bowen and Ostroff (2004) suggest that organisations use the HPWS as a signalling system to send messages to their employees about service delivery and what is expected, encouraged and rewarded by the organisation to achieve customer satisfaction. There is accumulated research evidence that HPWSs have a positive impact on the service climate and thus on customer satisfaction (Hong et al., 2013; Michel, Kavanagh and Tracey, 2013). When an HPWS improves employee capabilities, motivates them and enables them to perform, their overall performance will be improved by the creation of desirable positive behaviours which, in turn, will promote positive convictions about the service climate that will ultimately enhance the firm’s profitability (Dyer and Reeves, 1995; Keoh and Wright, 2010; Hong et al., 2013; Michel, Kavanagh and Tracey, 2013). Accordingly, based on the argument of Bowen and Ostroff (2004), the present study suggests the following hypothesis.

**Hypothesis 5:** Service climate mediates the relationship between the HPWS and customer satisfaction.

Based on the theory of social exchange, the justifications described above and empirical studies on the relationship between HPWSs and customer satisfaction discussed in the previous chapter, this study assumes that the HPWS can affect customer satisfaction through employee outcomes and service climate. In other words, the effect of an HPWS on customer satisfaction will be mediated by employee outcomes and service climate simultaneously. The mechanism of influence of the HPWS begins with the variables nearest to the HPWS, the employee outcomes and service climate, which, in turn, affect the distal variable, which is customer satisfaction in the current study. Further, Conway and Briner (2015) reminded academics of the need to ‘more precisely specify proximal mediators between employee attitudes and customer satisfaction’. Accordingly, this study proposes the following hypotheses: Accordingly, this study proposes the following hypotheses:

**Hypothesis 6:** Employee outcomes and service climate mediate the relationship between the HPWS and customer satisfaction.
3.3.3 Moderation effects in the HPWS-customer satisfaction link

This section concerns the moderating role of agencification in the relationships between the HPWS and customer satisfaction by addressing the following question ‘To what extent does agencification moderate the relationship between the HPWS and customer satisfaction?’.

As discussed in detail in the last chapter, the scholars of NPM and public-sector officials tend to advocate for improved performance in this sector by adopting the agencification process. The main focus of the agencification process is to disaggregate large public organisations and turn them into the opposite of government bureaucracy by applying a business-like model (Thiel and CRIPO team, 2009). The resulting new semi-autonomous and autonomous organisations are granted managerial autonomy, allowing them to choose the appropriate HRM system that best suits their objectives (Pollitt et al., 2004; Thiel and CRIPO team, 2009; Zahra and Jadoon, 2016). Thus, managerial autonomy plays a vital role in transforming traditional government entities into market-driven entities, which leads to higher quality and efficiency as the organisation become more client- and cost-aware (Thiel and CRIPO team, 2009). Moreover, the SHRM scholars argue that HRM systems can be a ‘source of sustainable competitive advantage’ (Pfeffer, 1994; Becker and Gerhart, 1996; Boxall, 1996; Delery and Roumpi, 2017). Little attention has also been directed towards analysing possible moderation effects in the relationship between the HPWS and organisational performance as most efforts focus on the analysis of mediating variables (Innocenti, Pilati and Peluso, 2011). Thus, the current study, which proposes three pathways to pass from the HPWS to customer satisfaction, examines the mediation mechanism or so-called ‘black box’ via employee outcomes and service climate. Besides, this study will expand the SHRM and NPM literature by examining the moderating role of agencification in the relationship between the HPWS and customer satisfaction. Based on NPM’s claims that independent institutions with HRM autonomy would perform better than the bureaucratic government ministry because their HRM systems will have a more positive impact on staff outcomes and service climate, since the RBV theory suggests that the HPWS is a source of competitive advantage, which can make a difference between institutions, the current study suggests that there will be a significant difference in the extent of the influence of HPWS in the independent institutions resulting from the agencification process than what exists in the government ministries on the outcomes of the employee and the service climate. Accordingly, this study proposes the following hypothesis:
**Hypothesis 7a:** Agencification moderates the relationships between the HPWS and employee outcomes.

**Hypothesis 7b:** Agencification moderates the relationships between the HPWS and service climate.

If the claims made for agencification are true, then it is not only necessary that the impact of the HPWS on employee outcomes and service climate will be greater in the new autonomous organisations compared to the traditional ministries but also that the rest of the relationships of the dependent variables must have a stronger impact as their strength depends on the magnitude of the positive effect of the HPWS. Based on the theory of social exchange, the reciprocal relationship for the interests and benefits between the institution and its employees is a positive direct relationship, meaning that the greater the size of what is provided by the institution to the benefit of its employees will be met by an increase in the response of employees in the form of increasing positive attitudes and behaviour which in turn will positively enhance the service climate and customer satisfaction. Accordingly, based on the theory of social exchange this study proposes the following hypotheses:

**Hypothesis 7c:** Agencification moderates the relationships between employee outcomes and service climate.

**Hypothesis 7d:** Agencification moderates the relationships between employee outcomes and customer satisfaction.

Based on the argument of Bowen and Ostroff (2004), the organisation's service climate is the result of growing staff convictions about the organisation's encouraging practices to achieve customer satisfaction. The HPWS contributes directly to the development of these convictions, so the service climate in independent institutions is expected to be higher than in ministries due to HPWS impact strength. According to NPM's claims, the independent institutions resulting from the agencification process are more client-aware (Thiel and CRIPO team, 2009). Also, according to Dietz, Pugh and Wiley (2004) and Mayer, Ehrhart and Schneider (2009), there are still opportunities to help develop service climate theory by examining additional moderators in the relationship that combine service climate with customer satisfaction. Accordingly, based on the argument of Bowen and Ostroff (2004) and the NPM's claims, the present study suggests the following hypothesis.

**Hypothesis 7e:** Agencification moderates the relationships between service climate and customer satisfaction.
3.4 Summary

This chapter presents the hypothesis development process and the theoretical framework. This theoretical framework aims to examine the impact of the HPWS (recruitment and selection, training, incentives and rewards, internal career ladders, performance appraisal, employee voice and participation, job rotation and broadly defined job) on employee outcomes (job satisfaction, organisational commitment, trust, motivation and intention to remain) and the service climate and the relationship between them along with the direct and indirect impact on customer satisfaction in the ministerial and non-ministerial departments in the public sector in the Sultanate of Oman. Figure 3.2 presents the hypothesised model for the current study, and Table 3.1 summarises the hypotheses proposed. The next chapter provides an overview of the methodology used to test the hypotheses proposed in the current research.
This consists of the following practices: recruitment and selection, training, incentives and rewards, internal career ladders, performance appraisal, employee voice and participation, job rotation and broadly defined job.

2. This consists of the following outcomes: job satisfaction, organisational commitment, trust, motivation and intention to remain.

Figure 3.2: Hypothesised model
<table>
<thead>
<tr>
<th>Hypothesis</th>
<th>Description</th>
</tr>
</thead>
<tbody>
<tr>
<td>1a</td>
<td>The HPWS is positively related to employee outcomes.</td>
</tr>
<tr>
<td>1b</td>
<td>The HPWS is positively related to service climate.</td>
</tr>
<tr>
<td>1c</td>
<td>The HPWS is positively related to customer satisfaction.</td>
</tr>
<tr>
<td>2a</td>
<td>Employee outcomes are positively related to service climate.</td>
</tr>
<tr>
<td>2b</td>
<td>Employee outcomes are positively related to customer satisfaction.</td>
</tr>
<tr>
<td>3</td>
<td>Service climate is positively related to customer satisfaction.</td>
</tr>
<tr>
<td>4a</td>
<td>Employee outcomes mediate the relationship between the HPWS and customer satisfaction.</td>
</tr>
<tr>
<td>4b</td>
<td>Employee outcomes mediate the relationship between the HPWS and service climate.</td>
</tr>
<tr>
<td>5</td>
<td>Service climate mediates the relationship between the HPWS and customer satisfaction.</td>
</tr>
<tr>
<td>6</td>
<td>Employee outcomes and service climate mediate the relationship between the HPWS and customer satisfaction.</td>
</tr>
<tr>
<td>7a</td>
<td>Agencification moderates the relationships between the HPWS and employee outcomes.</td>
</tr>
<tr>
<td>7b</td>
<td>Agencification moderates the relationships between the HPWS and service climate.</td>
</tr>
<tr>
<td>7c</td>
<td>Agencification moderates the relationships between employee outcomes and service climate.</td>
</tr>
<tr>
<td>7d</td>
<td>Agencification moderates the relationships between employee outcomes and customer satisfaction.</td>
</tr>
<tr>
<td>7e</td>
<td>Agencification moderates the relationships between service climate and customer satisfaction.</td>
</tr>
</tbody>
</table>
CHAPTER 4
METHODOLOGY AND RESEARCH DESIGN

4.1 Introduction

This chapter outlines the methodology and research design used to collect and analyse the data for use in examining the study’s hypotheses. It aims to link the conceptual framework developed with the empirical results presented in the next chapter. This chapter is organised around three main topics: the research paradigm, the research strategy, and the research design, as shown in Figure 4.1.

Figure 4.1: Outline of Chapter 4
4.2 Research Paradigm

Historically, researchers have sought to discover the truth of things through multiple schools of thought. Some of these hold that the truth is an objective matter that exists around us, while others propose that it is subjective and depends on our mental perceptions of that truth (Sekaran and Bougie, 2016). Saunders, Lewis and Thornhill (2016), in their book *Research Methods for Business Students* (p. 124) defined a research philosophy as ‘a system of beliefs and assumptions about the development of knowledge’. They classified assumptions that the researcher will have to make when embarking on research into three types: ontology, epistemology and axiology. Ontology, which is the philosophical study of what can be supposed to exist (Sekaran and Bougie, 2016) or the ‘science of, or the study of being’ (Crotty, 1998), raises questions about the nature of reality, and it refers to the claims or assumptions that a particular approach to social enquiry makes about the nature of social reality (Saunders, Lewis and Thornhill, 2016), i.e. about things that ‘do or can exist, the conditions of their existence, and the ways in which they are related’ (Blaikie, 2010). Epistemology is how we come to know the nature of knowledge (Sekaran and Bougie, 2016). It is concerned with ‘assumptions about knowledge, what constitutes acceptable, valid and legitimate knowledge, and how we can communicate knowledge to others’ (Burrell and Morgan, 1979, Saunders, Lewis and Thornhill, 2016). Thus, epistemology leads one to choose certain methods over others or toward different questions. Axiology is ‘the role of values and ethics within the research process’ (Saunders, Lewis and Thornhill, 2016, p. 128).

The different fundamental beliefs and assumptions regarding ontology, epistemology and axiology lead to several approaches to research paradigms. The most important research paradigms for contemporary research in business are positivism, constructivism, critical realism and pragmatism (Sekaran and Bougie, 2016). Positivism is based on the belief in truth as an objective matter that exists and operates according to the law of cause and effect and can be discerned using a scientific approach (Sekaran and Bougie, 2016). Constructivism is the opposite view; it believes that reality is mentally constructed, subjective and relativistic and not absolute (Yin, 2016; Sekaran and Bougie, 2016). Critical realism is a combination of two views: positivism and constructivism. It holds that reality is the objective truth but rejects at the same time that it can be objectively measured (Sekaran and Bougie, 2016). Pragmatism believes that multiple views and positions can be used in solving and answering research questions (Wahyuni, 2012; Sekaran and Bougie, 2016).
The researcher’s assumptions regarding the research philosophy for the current study are based on the positivist paradigm. The positivism relates to the ‘philosophical stance of the natural scientist and entails working with an observable social reality to produce law-like generalisations’ (Saunders, Lewis and Thornhill, 2016, p. 135). The ontology or the nature of reality is assumed to be independent of the mind of the researcher; thus, the reality is out there, and by objective investigation via the scientific method, it can be captured. Positivism is almost completely dominant in the research field of SHRM, especially in the study of HPWSs and their impact on employees and other organisational outcomes (Van Buren, Greenwood and Sheehan, 2011).

4.3 Research Strategy

4.3.1 Research approach

The two main approaches to theory development are deduction and induction. Deduction derives its conclusions logically from a set of premises (Ketokivi and Mantere, 2010; Saunders, Lewis and Thornhill, 2016). Induction, in contrast, uses the observed premises to generate conclusions (Ketokivi and Mantere, 2010; Saunders, Lewis and Thornhill, 2016). Deductive reasoning has been used to conduct this research. This is possible due to the existence of adequate literature (as presented in Chapter 2) that helps in developing research hypotheses, operationalising concepts and developing a research model. Having selected this type of reasoning, scientific data collection and data analysis followed and subsequent logical deductions based on the results of the study, which is known as ‘theory precedes data’ approach. Table 4.1 outlines the main differences between deductive and inductive approaches to theory development.

<table>
<thead>
<tr>
<th>Table 4.1: Main Differences between Approaches to Theory Development</th>
</tr>
</thead>
<tbody>
<tr>
<td><strong>Logic</strong></td>
</tr>
<tr>
<td>Logic</td>
</tr>
<tr>
<td>Generalisability</td>
</tr>
<tr>
<td>Use of data</td>
</tr>
<tr>
<td>Theory</td>
</tr>
</tbody>
</table>

Source: Saunders, Lewis and Thornhill (2016)
4.3.2 Research methodology

There are two primary research methodologies: quantitative and qualitative. Quantitative research is generally associated with the positivist paradigm primarily in that it performs both data collection and analysis on quantitative measurement (Saunders, Lewis and Thornhill, 2016). In contrast, qualitative research is often associated with the constructivist paradigm and emphasises examining subjective data (Saunders, Lewis and Thornhill, 2016). In the current study, the focus has been placed on the quantitative methodology. Accordingly, the design of this research is quantitative and uses a single data collection technique, which is the questionnaire survey, with a corresponding quantitative analytical procedure. That classifies it as a mono-method quantitative study. Table 4.2 below outlines the differences between quantitative and qualitative research.

Table 4.2: Differences between Quantitative and Qualitative Research

<table>
<thead>
<tr>
<th></th>
<th>Quantitative</th>
<th>Qualitative</th>
</tr>
</thead>
<tbody>
<tr>
<td>Research Philosophy</td>
<td>Positivism</td>
<td>Constructivism</td>
</tr>
<tr>
<td>Reasoning Type</td>
<td>Deductive; testing of theory</td>
<td>Inductive; generation of theory</td>
</tr>
<tr>
<td>Data collection</td>
<td>In a standard manner (i.e. survey)</td>
<td>Non-standardised (i.e. interview)</td>
</tr>
<tr>
<td>Data analysis</td>
<td>Statistical (i.e. SEM)</td>
<td>Analytical (i.e. thematic analysis)</td>
</tr>
</tbody>
</table>

Source: Saunders, Lewis and Thornhill (2016) and Bryman and Bell (2015)

4.3.2 Research type

There are three basics types of research: exploratory, descriptive and explanatory. Exploratory research is used to find out what is going on and to get a clearer picture of the subject matter (Saunders, Lewis and Thornhill, 2016). Its primary purpose is to develop a fundamental understanding or a rough description of a research problem (Blaikie, 2010). Descriptive research is used to obtain data or profiles that accurately describes the topic of interest, such as persons, events or situations (Saunders, Lewis and Thornhill, 2016). It therefore, provides a detailed or precise measurement and an account of the phenomenon under research (Blaikie, 2010). It is designed primarily to describe what is going on or what exists (Trochim, Donnelly and Arora, 2015). Also, descriptive research is used to describe relations between variables and could be referred to as correlational research (Sekaran and Bougie, 2016).

Explanatory research is used to establish causal relationships between variables (Saunders, Lewis and Thornhill, 2016). Its emphasis is on cause and effect; thus, it often adopts an experimental design to establish causal relationships (Sekaran and Bougie, 2016). In
accordance with the purposes of the present study, descriptive research fits the nature of the research questions because its main concern is to describe the relations between variables, guided by specific hypotheses such as those developed via the literature review in Chapter 3.

4.4 Research Design

A research design is a framework or plan for collecting, measuring and analysing data to answer one or more research questions (Sekaran and Bougie, 2016). In this section, the elements of the research design of the current research are detailed.

4.4.1 Data collection

In accordance with the nature of the data required for this study, a self-completed questionnaire was developed and implemented with targeted professionals (middle/line managers, section heads and employees) who have a direct connection with end users/customers in 15 governmental entities in the public sector in Oman: 10 ministerial departments and five non-ministerial departments. These entities have been chosen for this study because they represent the core services of the public sector in Oman. Also, the staff with a direct relationship to customers are most likely to provide a reliable assessment of customer satisfaction with the level of service provided to them, which was vital information required by this study to validate its measure of customer satisfaction. The sample size in this study was chosen based on the requirements of SEM, which is the primary data analysis method used in the current research. Hair et al. (2016) suggested a ratio from five to ten respondents for each estimated parameter. Accordingly, based on the complexity of the proposed conceptual model, a sample size of 500 is considered suitable for this study, which was drawn from the actual population of 156,800 employees in the 15 governmental entities in the public sector in Oman, as shown in Table 4.3. The researcher explained the purpose of the study to the human resources director in each of the 15 governmental entities of the public sector in Oman (the target population) and gave them 50 questionnaires each to be distributed amongst middle/line managers, section heads and other employees who have a direct connection with the end users. The questionnaires were collected after ten working days. Thus, the researcher distributed 755 questionnaires, about 50 per cent more than the sample size of 500, in anticipation of a low response rate. A total of 544 completed questionnaires from the questionnaires distributed were returned to the researcher, giving a response rate of 72.1 per cent. More details about the response rate will be discussed in Chapter 5.
4.4.1.1 Method of data collection

The current study adopted a cross-sectional survey strategy and used a self-administered questionnaire as a data collection instrument. The survey strategy is commonly used in business research and specifically in descriptive research (Sekaran and Bougie, 2016). Questionnaires will help the researcher to identify and describe the variability of different phenomena (Saunders, Lewis and Thornhill, 2016). Thus, this instrument is considered appropriate for the current descriptive research as it focuses on attitudes and perceptions of individuals and examines relationships between variables (Baruch and Holtom, 2008; Saunders, Lewis and Thornhill, 2016). Moreover, the time horizon of the cross-section chosen for this research design is more representative of the general population (Malhotra and Birks, 2007) and less time consuming considering the nature of this PhD study, which is time constrained (Saunders, Lewis and Thornhill, 2016).

4.4.1.2 Sampling process

The process of selecting the right elements for a sufficient sample of a population is called sampling (Sekaran and Bougie, 2016). The present study followed the five major steps in sampling based on the suggestions of Sekaran and Bougie (2016). Figure 4.2 illustrates the steps of the sampling process.

**Figure 4.2:** Five major steps in the sampling process

1. Define the population
2. Determine the sample frame
3. Determine the sampling design
4. Determine the appropriate sample size
5. Execute the sampling process

*Source: Sekaran and Bougie (2016), p. 240*
Step 1: Define the population

The target population must be precisely defined before the sampling process begins (Sekaran and Bougie, 2016). Accordingly, the target population for this study were the workers in the 15 governmental entities of the public sector in Oman. These governmental entities consist of 10 ministerial departments and five non-ministerial departments, as shown in Table 4.3. They have been chosen for this study because they represent the core services of the public sector in Oman, as discussed in detail in Chapter 1. Also, this number of different governmental entities from both ministerial and non-ministerial institutions will add to the strength of this study in terms of applicability (Andersen and Pedersen, 2012).

Step 2: Determine the sample frame

The sample frame represents all the elements which will be drawn from the target population (Sekaran and Bougie, 2016). The sample frame for this survey consists of professionals (middle/line managers, section heads and other employees) who have a direct connection with the end users/customers in the 15 governmental entities of the public sector in Oman, as presented in Table 4.3.

Step 3: Determine the sampling design

The sampling design is of two types: probability and nonprobability sampling (Sekaran and Bougie, 2016). The main difference between them is that the elements in the target population have some nonzero chance of being selected in probability sampling and do not have a known chance to be selected in nonprobability sampling (Sekaran and Bougie, 2016). The current study employed a nonprobability sampling design using judgment sampling or what is often

<table>
<thead>
<tr>
<th>Name of Ministerial Departments</th>
<th>Name of Non-Ministerial Departments</th>
</tr>
</thead>
<tbody>
<tr>
<td>Ministry of Health</td>
<td>Public Authority for Radio and Television</td>
</tr>
<tr>
<td>Ministry of Transport and Communications</td>
<td>Public Authority for Electricity and Water</td>
</tr>
<tr>
<td>Ministry of Housing</td>
<td>Information Technology Authority</td>
</tr>
<tr>
<td>Ministry of Social Development</td>
<td>Public Authority for Consumer Protection</td>
</tr>
<tr>
<td>Ministry of Manpower</td>
<td>Public Authority for Craft Industries</td>
</tr>
<tr>
<td>Ministry of Education</td>
<td></td>
</tr>
<tr>
<td>Ministry of Commerce and Industry</td>
<td></td>
</tr>
<tr>
<td>Ministry of Agriculture and Fisheries</td>
<td></td>
</tr>
<tr>
<td>Ministry of Regional Municipalities and Water Resources</td>
<td></td>
</tr>
<tr>
<td>Ministry of Tourism</td>
<td></td>
</tr>
</tbody>
</table>
called *purposive sampling* (Churchill and Iacobucci, 2005). Judgment sampling is used because it helps the researcher to reach the employees who have a direct connection with the end users within the target population. Judgment sampling is usually used when there is a limited number of people who have the required information (Sekaran and Bougie, 2016). In this case, staff with a direct relationship to customers are most likely to provide a reliable assessment of customer satisfaction with the level of service provided to them.

**Step 4: Determine the appropriate sample size**

The sample size in this study was chosen based on the requirements of SEM, which is the primary data analysis method used in the current research. Hair *et al.* (2016) suggested a ratio from five to ten respondents for each estimated parameter. Accordingly, based on the complexity of the proposed conceptual model, a sample size of 500 is considered suitable for this study.

**Step 5: Execute the sampling process**

The researcher distributed 755 questionnaires, about 50 per cent more than the sample size of 500, which is considered suitable for this type of study, in anticipation of a low response rate. A total of 544 completed questionnaires from the questionnaires distributed were returned to the researcher, giving a response rate of 72.1 per cent. More details about the response rate will be discussed in Chapter 5.

**4.4.1.3 Research ethics**

The research ethics committee of Brunel University had to approve the ethical compliance of this study because it involves human participants. The study requires information from people who work in the public sector. The participation is entirely voluntary, and every participant was given an information sheet to keep that contains enough information to inform the participants of the nature and purpose of this research while ensuring that all subjects are guaranteed confidentiality and anonymity regarding the data in general. All the data were stored safely on a Brunel server. No private identifiable information was stored with the dataset, which was used for research purposes only. Regarding access to the target population, there were no obstacles as this study was sponsored and supported by the Omani parliament. Thus, the researcher received full cooperation from the public-sector organisations.
4.4.2 Data measurement

4.4.2.1 Developing the questionnaire

The survey design employed used a questionnaire to measure the variables of interest in this research. In designing this questionnaire, the researcher followed the nine steps suggested by Churchill and Iacobucci (2005), as shown in Figure 4.3.

**Figure 4.3:** Steps for developing a questionnaire

1. Specify what information will be sought
2. Determine type of questionnaire and method of administration
3. Determine content of individual questions
4. Determine form of response to each question
5. Determine wording of each question
6. Determine sequence of questions
7. Design physical characteristics of questionnaire
8. Re-examine steps 1-7 and revise if necessary
9. Pre-test the survey; revise where needed

*Source:* Churchill and Iacobucci (2005), p. 234

**Step 1: Specify what information will be sought**

In Chapter 3, the current study developed specific hypotheses for investigation based on previous research. The hypothesised relationships between the variables under study are documented in the hypothesised model, also in Chapter 3. Thus, most of the information required for this research has been prepared according to that hypothesised model. Demographic questions were also included to identify other important information regarding the respondents.
Step 2: Determine the type of questionnaire and method of administration

The current study used a self-administered questionnaire as a data collection instrument. It was a ‘delivery and collection’ questionnaire that also included a Quick Response (QR) code for an electronic version of that questionnaire if the participant preferred to fill it out online. However, just 5.7 per cent of the participants chose the web questionnaire, which was on the following website: www.sogosurvey.com. The researcher explained the purpose of the study to the human resources director in each of the 15 governmental entities of the public sector in Oman (the target population) and gave them 50 questionnaires each to be distributed amongst middle/line managers, section heads and other employees who have a direct connection with the end users. The questionnaires were collected after 10 working days.

Step 3: Determine content of individual questions

The researcher’s previous decisions regarding the information required for this research and the type of questionnaire (Steps 1 and 2) shaped the content of the individual questions (Churchill and Iacobucci, 2005). Thus, the researcher, in seeking to ensure content validity, used only the following validated items from previous research to measure and operationalise the constructs in this research:

High-performance work system (HPWS). There is no consensus on HRM practices that comprise an HPWS, and they usually vary between studies (Posthuma et al., 2013). However, typically, an HPWS includes staffing, training, performance appraisal, compensation, job design, and involvement and participation (e.g. Datta, Guthrie and Wright, 2005; Sun, Aryee and Law, 2007; Takeuchi et al., 2007; Zacharatos, Barling and Iverson, 2005). Recent meta-analytic reviews show that HWPSs have continuously been positively linked to employee outcomes and other operational and financial outcomes of firms (Combs et al., 2006; Jiang, Lepak, Hu, et al., 2012). For this study, the HPWS of the AMO model was adopted in accordance with the recommendations of Jiang, Lepak, Hu, et al. (2012), as shown in Chapter 2. Accordingly, the HPWSs were divided into (1) practices that enhance ability, (2) practices that promote motivation and (3) practices to enhance staff participation. The total number of HPWS practices included was eight, and there were 32 items used to measure employee perceptions of those HPWS practices. These items were taken from previous research, as shown beside each item in Table 4.4. A seven-point Likert scale was used to measure the thirty-two items, ranging from 1 (strongly disagree) to 7 (strongly agree).
<table>
<thead>
<tr>
<th>Variables</th>
<th>Measurements / items</th>
<th>Reference</th>
</tr>
</thead>
</table>
| Recruitment and Selection         | 1. Considerable importance is placed on the staffing process by my institution.  
2. Very extensive efforts are made by my institution in selection.  
3. The recruitment and selection processes in this institution are impartial.  
4. Only the best people are hired to work in this institution.                                                                                         | Sun, Aryee and Law (2007)                                                 |
| Internal Career Ladders           | 5. Individuals in this job have clear career paths within the institution.  
6. Employees’ career aspirations within the institution are known by their immediate supervisors.  
7. Employees in this job who desire promotion have more than one potential position they could be promoted to.  
8. The promotion process used here is fair for all employees.                                                                                         | Delery and Doty (1996)                                                   |
| Training                          | 9. Extensive training programs are provided for individuals in this job.  
10. Employees in this job will normally go through training programs.  
11. There are formal training programs to teach new hires the skills they need to perform their jobs.  
12. Formal training programs are offered to employees in order to increase their promotability in this institution. | Delery and Doty (1996)                                                   |
| Performance Appraisal             | 13. Performance is more often measured with objective quantifiable results.  
14. Performance appraisals are based on objective, quantifiable results.  
15. Appraisals of my performance are fair and accurate.  
16. I receive regular and constructive feedback on how well I do my job.                                                                               | Delery and Doty (1996)                                                   |
| Employee Voice and Participation  | 17. Employees in this job are allowed to make many decisions.  
18. Employees in this job are often asked by their supervisor to participate in decisions.  
19. Employees are provided with the opportunity to suggest improvements in the way things are done.  
20. Superiors keep open communications with employees in this job.                                                                                   | Delery and Doty (1996)                                                   |
22. The incentive system at my institution is fair at rewarding people who accomplish the institutional objectives.
23. The incentive system at my institution encourages people to reach institution goals.
24. The incentive system at my institution really recognises people who contribute the most to the institution.

<table>
<thead>
<tr>
<th>Job Rotation</th>
<th>25. I believe job rotation is a type of job training.</th>
<th>Campion, Cheraskin and Stevens (1994); Arya and Mittendorf (2004); Ho, Chang and Shih (2009)</th>
</tr>
</thead>
<tbody>
<tr>
<td>26. Job rotation broadens my knowledge and skill in other fields.</td>
<td></td>
<td></td>
</tr>
<tr>
<td>27. I believe job rotation is an excellent system.</td>
<td></td>
<td></td>
</tr>
<tr>
<td>28. Overall, I like job rotation.</td>
<td></td>
<td></td>
</tr>
</tbody>
</table>

<table>
<thead>
<tr>
<th>Broadly Defined Job</th>
<th>29. The duties of this job are clearly defined.</th>
<th>Delery and Doty (1996)</th>
</tr>
</thead>
<tbody>
<tr>
<td>30. This job has an up-to-date job description.</td>
<td></td>
<td></td>
</tr>
<tr>
<td>31. The job description for this job contains all of the duties performed by individual employees.</td>
<td></td>
<td></td>
</tr>
<tr>
<td>32. I have a job description that accurately describes the work I do.</td>
<td></td>
<td>Huselid (1995)</td>
</tr>
</tbody>
</table>

**Employee outcomes.** Many studies have highlighted that positive employee outcomes such as job satisfaction, organisational commitment, trust, motivation and intention to remain lead to increased levels of operational and financial performance (Appelbaum et al., 2000; Steijn, 2004; Collins, Ericksen and Allen, 2005; Katou and Budwar, 2006, 2010; Zhang and Morris, 2014). However, researchers have commonly focused on only one or two of the employee outcomes. In this study, a combined set of five employee outcomes has been operationalised simultaneously as a whole, as recommended by Mostafa and Gould-Williams (2014), to capture as many faces of the construct of employee outcomes to examine their mediating role in the relation between the HPWS and customer service, as shown in Chapter 3.

Nineteen items were used to measure employee perceptions of the above-mentioned five variables. These items were taken from previous research, as shown beside each item in Table 4.5. A seven-point Likert scale was used to measure the 19 items, ranging from 1 (strongly disagree) to 7 (strongly agree).
Table 4.5: Measurements of the Variables of the Employee Outcomes Construct

<table>
<thead>
<tr>
<th>Variables</th>
<th>Measurements / items</th>
<th>Reference</th>
</tr>
</thead>
<tbody>
<tr>
<td>Job Satisfaction</td>
<td>1. In general, I am satisfied with my job.</td>
<td>Depré and Hondeghem (1995); Vandenabeele (2009)</td>
</tr>
<tr>
<td></td>
<td>2. My current job fulfils the expectations I had before I started it.</td>
<td></td>
</tr>
<tr>
<td></td>
<td>3. My current job is pleasant.</td>
<td></td>
</tr>
<tr>
<td></td>
<td>4. I think my current job is interesting and fascinating.</td>
<td></td>
</tr>
<tr>
<td>Commitment</td>
<td>5. I am willing to work harder than I have to in order to help my institution succeed.</td>
<td>Meyer and Allen (1997); Porter et al. (1974)</td>
</tr>
<tr>
<td></td>
<td>6. I am proud to work for this institution.</td>
<td></td>
</tr>
<tr>
<td></td>
<td>7. I feel a strong sense of belonging to my institution.</td>
<td></td>
</tr>
<tr>
<td></td>
<td>8. I would refer a friend to come work at this institution.</td>
<td></td>
</tr>
<tr>
<td></td>
<td>10. In general, I trust my institution to keep its promises or commitments to me and other employees.</td>
<td></td>
</tr>
<tr>
<td></td>
<td>11. My institution has always kept its promises about the demands of my job and the amount of work required of me.</td>
<td></td>
</tr>
<tr>
<td>Motivation</td>
<td>12. I am always behaving in ways that help my institution’s performance.</td>
<td>Park et al. (2003)</td>
</tr>
<tr>
<td></td>
<td>13. I am always contributing in positive ways to the institution’s performance.</td>
<td></td>
</tr>
<tr>
<td></td>
<td>14. I am highly motivated compared to other employees in other institutions.</td>
<td></td>
</tr>
<tr>
<td></td>
<td>15. I am highly motivated.</td>
<td></td>
</tr>
<tr>
<td>Intention to Remain</td>
<td>16. I would turn down a job with more pay in order to stay with my institution.</td>
<td>Kehoe and Wright (2013)</td>
</tr>
<tr>
<td></td>
<td>17. I plan to spend my career at this institution.</td>
<td></td>
</tr>
<tr>
<td></td>
<td>18. I intend to stay at this institution for at least the next 12 months.</td>
<td></td>
</tr>
<tr>
<td></td>
<td>19. I do not plan to look for a job outside of this institution in the next six months.</td>
<td></td>
</tr>
</tbody>
</table>

Service climate. This item refers to ‘employee perceptions of the practices, procedures, and behaviours that get rewarded, supported, and expected with regard to customer service and customer service quality’ (Schneider, White and Paul, 1998). There is accumulated research evidence that HPWSs have a positive impact on the service climate via their impact on employees (Dyer and Reeves, 1995; Kehoe and Wright, 2010; Hong et al., 2013). Service climate was measured with a four-item scale developed by Schneider, White and Paul (1998). This scale is commonly used to measure this construct in this field (e.g. Salanova, Agut and Peiró, 2005; Auh et al., 2011). These items were measured on a seven-point Likert scale ranging from 1 (strongly disagree) to 7 (strongly agree).
(1) I have knowledge of the job and the skills to deliver superior quality work and service.
(2) I receive recognition and rewards for the delivery of superior work and service.
(3) The overall quality of service provided by me to customers is excellent.
(4) I am provided with the necessary resources to support the delivery of quality work and service.

Customer satisfaction. In this study, customer satisfaction is measured by the perceptions of employees. The perception of customer satisfaction by employees is vital to measure the impact of an HPWS on employees’ attitudes and behaviour, which are critical factors for customer satisfaction (Lee, Lee and Kang, 2012). An HPWS is assumed to improve service quality and, in turn, customer satisfaction by operating and managing work processes in furtherance of those aims (Lee, Lee and Kang, 2012). Besides, employees in the service sector are in direct contact with their customers, and the boundary between them is considered flimsy and permeable as the services are produced and consumed simultaneously (Schneider and Bowen, 1993). Therefore, using employee perceptions of customer satisfaction has been empirically proven to be a perfect proxy for actual customer satisfaction (Schneider and Bowen, 1993; Davidson, 2003). In addition to that, many researchers consider it difficult to gather feedback from a customer in an unbiased form, particularly in the service sector regarding, for instance, their satisfaction (Davidson, 2003; He, Li and Lai, 2011). In the current study, the overall satisfaction of end users has been adapted to capture customer satisfaction as it is classified amongst the most precise measures of customer satisfaction (Szymanski and Henard, 2001; He, Li and Lai, 2011).

Customer satisfaction was measured with three modified items based on the scale developed by Hallowell (1996) and He, Li and Lai (2011). These items were measured on a seven-point Likert scale ranging from 1 (strongly disagree) to 7 (strongly agree).

(1) I think that our customers are satisfied with our services generally.
(2) I think that our customers are provided with high-quality service.
(3) I think that our customers feel pleased with our institution.

Step 4: Determine the form of response to each question

The current study adopted a closed-ended questionnaire as the form of response to all questions. The form of response of the first four questions, which covered all the constructs of this study (HPWS, employee outcomes, service climate and customer satisfaction) was a seven-point
Likert scale in order that uniformity could be ensured. This scale ranged from 1 (*strongly disagree*) to 7 (*strongly agree*). Also, the demographic questions at the end of this questionnaire used a combination of dichotomous and multichotomous questions.

**Step 5: Determine the wording of each question**

The fifth step in the development process of this questionnaire is a critical task because it involves the question phrasing (Churchill and Iacobucci, 2005). Poor phrasing will cause either *item nonresponse*, which is skipping over the question by participants, or answering it incorrectly, leading to a *measurement error*, according to Churchill and Iacobucci (2005). Thus, to enhance the wording of the questions during the development process of this questionnaire, the following rules of thumb were followed, as suggested by Churchill and Iacobucci (2005).

1. *Use simple words.*
2. *Avoid ambiguous words and questions.*
3. *Avoid leading questions,* which means giving a clue to answering the question.
4. *Avoid double-barrelled questions,* which means questions that call for two responses.

**Step 6: Determine the sequence of questions**

The question sequence can be crucial (Churchill and Iacobucci, 2005). Thus, to enhance the sequence of the questions during the development process of this questionnaire, the following rules of thumb were followed, as suggested by Churchill and Iacobucci (2005).

1. *Use simple and interesting opening questions.*
2. *Use the funnel approach,* which means starting with the broad questions and gradually narrow the scope. Thus, the first questions asked were about HPWS and then narrowed in scope to questions about rating customer satisfaction.
3. *Placing sensitive questions late in the questionnaire.* Accordingly, demographic questions, which include personal characteristics, were placed at the end of the questionnaire.

**Step 7: Design the physical characteristics of the questionnaire**

According to Churchill and Iacobucci (2005), it is essential to pay attention to the final appearance of the questionnaire as it can affect the respondents’ reactions and the accuracy of their replies as well as affect the ease of processing the questionnaire by both of the researcher
and the participant. Thus, to enhance the physical characteristics of the questionnaire, two tips suggested by Churchill and Iacobucci (2005) were followed.

1. **Acceptance of the questionnaire.** This indicates the importance of the professional look of the questionnaire, which includes introducing a cover letter to convince the participant to cooperate and ensure confidentiality. It also includes taking care about the printing quality of the questionnaire and the layout, such as by organising questions logically and neatly in proper sections as well as providing instructions on how to fill out the questionnaire (Sekaran and Bougie, 2016).

2. **Facilitate handling and control.** This was accomplished by shortening the length of the questionnaire to three pages to increase the response rate and numbering the questions as it facilitates the handling process in coding, editing and tabulating the responses.

**Step 8: Re-examine steps 1–7 and revise if necessary**

Re-examination and revision of the first drafts of the questionnaire were conducted several times by the researcher and his supervisor to ensure that there were no vague, confusing or biased questions, as suggested by Churchill and Iacobucci (2005).

**Step 9: Pre-test the survey; revise where needed**

Pretesting the performance of the questionnaire under real conditions of data collection is vital (Churchill and Iacobucci, 2005). However, it was necessary first to translate the current questionnaire into Arabic, in accordance with the research context, and then pre-test it. The following sub-section will discuss the process of translating the questionnaire.

**4.4.2.2 Translating and pre-testing the questionnaire**

According to Sperber (2004), it is crucial that when a questionnaire is used in another language, it must undergo a translation process that takes into account cultural differences. This process may take time and money but is necessary so that the validity of the search results is not in question (Sperber, 2004). There are three main approaches to the translation process: direct translation, committee translation and back translation. However, back translation is the superior and most rigorous of these translation processes (Brislin, 1980; Su and Parham, 2002). In this process, which requires two translators, the first one translates the questionnaire into the target language, and the second translator, who did not read the original questionnaire, translates it back again into the source language. The two versions are then compared, and the better they match, the more accurate the translation process is (Sperber, 2004). According to
Su and Parham (2002), adding a pre-test step after back translation is completed is necessary to validate the translation. The pre-test must be carried out among the target population of the research so that any feedback on the questionnaire may be used later to update it (Su and Parham, 2002).

Accordingly, the survey instrument of this study was translated from English to Arabic in accordance with the procedure of back translation. This was followed by a pilot study as a pre-testing stage. First, the questionnaire was translated into the Arabic language by an expert bilingual translator. Then, another translator translated it back into English. After that, both translators reviewed the translation and reached a consensus on that instrument. At this stage, two human resource managers in the Omani public sector were involved to review that translation. Both were native speakers of Arabic and were competent in the English language. After the discussion, they reached a consensus on the translation, and the Arabic version was ready for pre-testing.

A small pilot study was conducted in Oman in April 2016 that involved around five per cent of the final target population. Forty-six samples were collected from three governmental entities (two ministerial departments and one non-ministerial department in the Omani public sector), with a response rate of 85.2 per cent. The two ministerial departments are the Ministry of Agriculture and Fisheries and the Ministry of Education. The non-ministerial department is the Public Authority for Consumer Protection. All participants were asked to give their comments about the questionnaire if they met with any problems in understanding its instructions or items. In the end, no changes were made to the final draft of the questionnaire.

4.4.2.3 Managing common method bias

The data collected during this study were cross-sectional. The participants provided their opinion on predictor (independent) variables and criterion (dependent) variables at a single contact. Thus, the data may be subject to common method bias (CMB). CMB refers to the ‘variance that is attributable to the measurement method rather than to the constructs the measures represent’ (Podsakoff et al., 2003). In the context of SEM, CMB is also defined as ‘a phenomenon that is caused by the measurement method used in an SEM study, and not by the network of causes and effects in the model being studied’ (Kock, 2015). Most researchers in behavioural research agree that CMB is potentially problematic as it threatens the validity of the measurement method (Podsakoff et al., 2003; Podsakoff et al., 2012).
However, according to Podsakoff et al. (2012), several methods could be implemented to minimise or control potential CMB. First, introducing a psychological separation between the measures of the variables (predictor and criterion) decreases the salience of the linkage between them. Thus, the design of the current survey employs psychological separation. Each group of questions regarding predictor and criterion variables is separated and located in a different section with its own set of instructions. The participants, therefore, are forced before jumping to answer the next group of questions to read first the instructions, which it reduces the chances that the respondent will use previous answers. Second, the respondents were told in the cover letter that there were no right or wrong answers and their responses would be kept anonymous. Finally, the elimination of the ambiguity of the scale items and the wording of questions were taken into account during the preparation of this questionnaire, as explained in Step 5 of the process of developing the questionnaire.

The current study employed the partial least squares method (PLS-SEM) to analyse the data. Thus, a full collinearity test was performed as a statistical check to detect and control any CMB. According to Kock (2015), this test is more powerful in the identification of CMB compared to the standard criteria of convergent and discriminant validity assessment based on a confirmation factor analysis. A model is considered to be contaminated by CMB if all variance inflation factors (VIFs) resulting from a full collinearity test are greater than 3.3; otherwise, the model can be considered free of CMB (Kock and Lynn, 2012; Kock, 2015). The results of the assessment of CMB are presented in Chapter 5.

4.4.2.4 Assessment of multigroup invariance

Since the research sample was collected from ministerial and non-ministerial departments, the multigroup invariance was tested via the procedure recommended by Hair et al. (2018) to test the measurement invariance of composite models (MICOM). When measurement invariance (also referred to as measurement equivalence) is established, then it can be assumed with confidence that group differences in the model estimates do not result from the distinctive content and or the meaning of the construct across groups; rather, they represent actual differences in the structural relationships (Hair et al., 2018). The MICOM procedure includes three steps: the assessment of configural invariance, of compositional invariance and of the equality of composite mean values and variances, as shown in Figure 4.4 (Hair et al., 2018). Once the configural invariance (Step 1) and the compositional invariance (Step 2) are confirmed, then the multigroup analysis is feasible because partial measurement invariance is
established (Hair et al., 2018). The results of the MICOM procedure for the current study will be discussed in more detail in Chapter 5.

**Figure 4.4: The MICOM procedure**

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**Source:** Hair et al. (2018), p. 141

### 4.4.3 Data analysis

The aim of the empirical analysis for the current study is to examine the interrelationships between multiple exogenous (independent) and endogenous (dependent) variables (the HPWS and customer satisfaction) and the mediating effects of employee outcomes and service climate on these relationships. According to Hair et al. (2016), SEM is the most efficient and appropriate estimation technique to be used when the researcher seeks to examine the
relationships among multiple variables simultaneously. Accordingly, PLS-SEM was employed as the primary method of data analysis in the current study.

4.4.3.1 The procedure for applying PLS-SEM

According to Hair et al. (2017), when a research study includes the application of SEM, then it is essential as a first step to prepare a path model to illustrates the variables that will be examined. There are two elements in that path model: the structural model and the measurement model (Hair et al., 2018). More details about these models and the suggested systematic procedure by Hair et al. (2017) (see Figure 4.5) when PLS-SEM is applied are covered in this section.

Figure 4.5: A systematic procedure for applying PLS-SEM

---

Source: Hair et al. (2017), p. 30
Step 1: Specifying the Structural Model

The structural model describes the relationships between the latent variables. In PLS-SEM, it is called the *inner model* (Hair *et al*., 2018). Two main issues need to be considered when developing the structural model: sequence and the relationship between the constructs (Hair *et al*., 2018). The sequence of the constructs could be based on theory, logic or observed practical experiences by the researcher (Hair *et al*., 2018). After that, the relationship between the constructs are established by drawing arrows (Hair *et al*., 2018). In the current research, there are two constructs that are quite complex (the HPWS and employee outcomes). They were operationalised at a higher level as second-order constructs. Thus, the lower-order components were summarised into a single, multidimensional, higher-order construct which reduces model complexity and leads to greater parsimony (Hair *et al*., 2018).

Step 2: Specifying the Measurement Model

The measurement model describes the relationships between the latent variables (constructs) and their indicators (Hair *et al*., 2018). In PLS-SEM, it is called the *outer model* (Hair *et al*., 2018). Nowadays, almost all researchers in the social sciences use established scales published in previous studies (Hair *et al*., 2018). In the current research, this approach was used, and all the indicators used were shown along with their reference in the previous section (see 4.4.2).

Step 3: Data Collection and Examination

In this step, the collected data need to be examined for certain issues, such as missing data, suspicious response patterns, outliers and data distributions (Hair *et al*., 2018). The examination of the current data of this study will be discussed in more detail in Chapter 5.

Step 4: PLS Path Model Estimation

In this step, the PLS path model estimation was selected according to the recommended algorithmic options and parameter settings by Hair *et al*. (2017). These options and settings include the structural model path weighting method, the metric of data, the stop criterion and the maximum iterations number (Hair *et al*., 2018). The estimation of the PLS path model of the current study will be discussed in more detail in Chapter 5.

Step 5: Assessing PLS-SEM Results of the Measurement Model

The evaluation of the measurement model is carried out based on empirical measures that include reliability, convergent validity and discriminant validity (Hair *et al*., 2018). There are
two separate assessment processes of measurement models: one is for reflectively measured constructs, and the other is for formatively measured constructs (Hair et al., 2018). The assessment of reflective constructs includes assessing internal consistency (i.e. Cronbach’s alpha; composite reliability should be higher than 0.70), convergent validity (i.e. indicator loading should be higher than 0.70 and average variance extracted (AVE) should be higher than 0.50) and discriminant validity using the heterotrait-monotrait (HTMT) ratio and the Fornell-Larcker criterion (Hair et al., 2018). The assessment of formative constructs includes assessing content validity, construct validity (i.e. significance and relevance of outer weights), and reliability (i.e. collinearity between indicators should be lower than 5) (Petter, Straub and Rai, 2007;Hair et al., 2017). The evaluation of the measurement model of the current study will be discussed in more detail in Chapter 5.

**Step 6: Assessing PLS-SEM Results of the Structural Model**

The evaluation of structural model results includes the examination of the constructs’ relationships and the model’s predictive capabilities (Hair et al., 2018). The main criteria for assessment are collinearity issues, the significance and relevance of the path coefficients, the level of the R² values, the f² effect size and the predictive relevance Q² (Hair et al., 2018). Also, the model fit could be assessed on PLS-SEM-based measures such as standardised root mean square residual (SRMR) and normed fit index (NFI). The goodness-of-fit index (GoF) is not applicable to a formatively measured model (Hair et al., 2018).

**4.5 Summary**

This chapter has provided detailed information about the research paradigm, the research strategy, and the research design of the current study. The researcher’s assumptions regarding the research philosophy for the current study are based on a positivist paradigm; accordingly, quantitative research strategies have been discussed. The current study is based on a deductive approach and classified as a descriptive cross-sectional study. Also, the design of the questionnaire for the present study was developed according to the nine steps suggested by Churchill and Iacobucci (2005). Finally, PLS-SEM was employed as the primary method of data analysis in the current study. Figure 4.6 summarises the design of the current study via the research ‘onion’. The results of the data analysis are presented in the next chapter.
Figure 4.6: The research ‘onion’ depicting the current study

Source: Saunders, Lewis and Thornhill (2016)
CHAPTER 5
ANALYSIS AND RESULTS

5.1 Introduction

This chapter focuses on the descriptive analysis, data preparation and screening, and data analysis. The Statistical Package for Social Sciences (SPSS) version 23.0 was used for the descriptive analysis of the data and data preparation and screening. For data analysis, PLS-SEM (v. 3.2.7) was used. Figure 5.1 displays the outline of this chapter.

Figure 5.1: Outline of Chapter 5
5.2 Descriptive Analysis

5.2.1 Response rate and non-response bias

As shown in detail in Table 5.1, the researcher distributed 755 questionnaires, 50 per cent more than the sample size of 500 in anticipation of a low response rate, which is considered suitable for this study. A total of 544 completed questionnaires from the questionnaires distributed were returned to the researcher, yielding a response rate of 72.1 per cent. Of these, only 521 were useable for analysis due to suspicious response patterns such as straight lining and diagonal lining. According to Baruch and Holtom (2008), for studies in organisational research that collect data from individuals, the average response rate is 52.7 per cent, with a standard deviation of 20.4. As the response rate of the current study is 20 per cent higher than that average response rate, it is therefore considered to be satisfactory.

Table 5.1: Response Rate of Questionnaires Distributed

<table>
<thead>
<tr>
<th>Name</th>
<th>Distributed</th>
<th>Collected</th>
<th>Useable</th>
<th>Response rate</th>
</tr>
</thead>
<tbody>
<tr>
<td>Ministerial Departments</td>
<td>505</td>
<td>396</td>
<td>378</td>
<td>78.4</td>
</tr>
<tr>
<td>Non-Ministerial Departments</td>
<td>250</td>
<td>148</td>
<td>143</td>
<td>59.2</td>
</tr>
<tr>
<td>Total</td>
<td><strong>755</strong></td>
<td><strong>544</strong></td>
<td><strong>521</strong></td>
<td><strong>72.1</strong></td>
</tr>
</tbody>
</table>

According to Hair et al. (2013), to maximise confidence in results, the potential bias of non-response, also known as non-response error, should not be neglected. Thus, to test the potential non-response bias, independent sample t-tests were conducted between the early respondents and the late respondents, as recommended by Armstrong and Overton (1977). The results showed that there were no significant differences amongst most of the variables between the two groups, suggesting that non-response bias does not pose a significant problem in the present study.

5.2.2 Demographic profile of the sample

The demographic profile of the employee respondents is presented in Table 5.2. Of the total respondents, 36.3 per cent were female, and 63.7 per cent were male. Regarding the age of respondents, almost half of the respondents (47.4%) were between 31 and 40 years of age; 33.8 per cent were between 20 and 30; and the rest were over 40. Regarding educational level, 55.3
per cent of the respondents had a bachelor’s degree; 11.5 per cent had a master’s degree; 0.8 per cent had a PhD degree; and the remainder had a diploma or other educational qualification. In total, 378 respondents (72.6%) were employed in ministerial departments, and 143 (27.4%) were employed in non-ministerial departments.

Table 5.2: The Overall Demographic Profile of the Participants

<table>
<thead>
<tr>
<th>Demographic Variable</th>
<th>Category</th>
<th>Sample (n = 521)</th>
<th></th>
<th></th>
</tr>
</thead>
<tbody>
<tr>
<td></td>
<td></td>
<td>Frequency</td>
<td>Percentage (%)</td>
<td></td>
</tr>
<tr>
<td>Gender</td>
<td>Male</td>
<td>332</td>
<td>63.7</td>
<td></td>
</tr>
<tr>
<td></td>
<td>Female</td>
<td>189</td>
<td>36.3</td>
<td></td>
</tr>
<tr>
<td>Age</td>
<td>20–30 years</td>
<td>176</td>
<td>33.8</td>
<td></td>
</tr>
<tr>
<td></td>
<td>31–40 years</td>
<td>247</td>
<td>47.4</td>
<td></td>
</tr>
<tr>
<td></td>
<td>41–50 years</td>
<td>85</td>
<td>16.3</td>
<td></td>
</tr>
<tr>
<td></td>
<td>51–60 years</td>
<td>11</td>
<td>2.1</td>
<td></td>
</tr>
<tr>
<td></td>
<td>Over 60 years</td>
<td>2</td>
<td>0.4</td>
<td></td>
</tr>
<tr>
<td>Highest educational qualification</td>
<td>Diploma</td>
<td>152</td>
<td>29.2</td>
<td></td>
</tr>
<tr>
<td></td>
<td>Undergraduate</td>
<td>288</td>
<td>55.3</td>
<td></td>
</tr>
<tr>
<td></td>
<td>Master</td>
<td>60</td>
<td>11.5</td>
<td></td>
</tr>
<tr>
<td></td>
<td>PhD</td>
<td>4</td>
<td>0.8</td>
<td></td>
</tr>
<tr>
<td></td>
<td>Other</td>
<td>17</td>
<td>3.3</td>
<td></td>
</tr>
<tr>
<td>Current job</td>
<td>Middle / Line Manager</td>
<td>44</td>
<td>8.4</td>
<td></td>
</tr>
<tr>
<td></td>
<td>Section Head</td>
<td>125</td>
<td>24.0</td>
<td></td>
</tr>
<tr>
<td></td>
<td>Employee</td>
<td>352</td>
<td>67.6</td>
<td></td>
</tr>
<tr>
<td>Length of service in the current institution</td>
<td>Under 5 years</td>
<td>188</td>
<td>36.1</td>
<td></td>
</tr>
<tr>
<td></td>
<td>5–10 years</td>
<td>170</td>
<td>32.6</td>
<td></td>
</tr>
<tr>
<td></td>
<td>11–15 years</td>
<td>62</td>
<td>11.9</td>
<td></td>
</tr>
<tr>
<td></td>
<td>Over 15 years</td>
<td>101</td>
<td>19.4</td>
<td></td>
</tr>
<tr>
<td>Department type</td>
<td>Ministerial department</td>
<td>378</td>
<td>72.6</td>
<td></td>
</tr>
<tr>
<td></td>
<td>Non-ministerial department</td>
<td>143</td>
<td>27.4</td>
<td></td>
</tr>
</tbody>
</table>

5.2.3 Descriptive statistics of measurement scales

The questionnaire items related to the constructs of the research model (HPWS, employee outcomes, service climate and customer satisfaction) are shown in Table 5.3 as are the mean and the standard deviation (SD) of each item. A seven-point Likert scale measured all the items, ranging from 1 (strongly disagree) to 7 (strongly agree).

Table 5.3 shows that employee perceptions of HPWSs varied across practices. The respondents, on average, had positive perceptions regarding most of the practices of the HPWS
except for incentives and rewards, for which the mean of the respective items was less than four, which is the midpoint of the scale. Job rotation had the highest positive perceptions as the means of the respective items were higher than five, followed by broadly defined job and recruitment and selection with means of five and four, respectively. For the other HPWS practices, such as internal career ladders, training and performance appraisal, the scores were mixed. This difference may be due to participants’ differing perceptions of the aspects of these practices, indicating that some aspects of these practices were positively perceived by participants while others were negatively perceived. Also, the standard deviations were recorded, yielding a value of more than 1.50 for almost all the elements.

The findings in Table 5.3 reveal that the participants had positive perceptions of all employee outcomes. Commitment, motivation, job satisfaction and trust seemed to be high as the means of the respective items were above the midpoint of the scale. However, the respondents had mixed perceptions regarding intention to remain, especially in the long term. The standard deviations ranged from 1.229 to 2.013, indicating the variations of the perceptions of the respondents.

The participants had a positive perception of most of the dimensions of service climate, with a mean score more than four. However, they had a negative perception again regarding receiving recognition and rewards when they delivered superior work and service as well as a negative perception of the practice of incentives and rewards in the HPWS. All the items measuring service climate have standard deviations of more than one.

As shown in Table 5.3, the average of the three items of customer satisfaction is higher than four, indicating that respondents, on average, view their customers as satisfied. Also, all the items have almost the same standard deviation of around 1.3.
Table 5.3: Questionnaire Items and Descriptive Statistics

<table>
<thead>
<tr>
<th>Construct</th>
<th>Item</th>
<th>Description</th>
<th>Mean</th>
<th>SD</th>
</tr>
</thead>
<tbody>
<tr>
<td>HPWS</td>
<td>slc1</td>
<td>Considerable importance is placed on the staffing process by my institution.</td>
<td>4.758</td>
<td>1.581</td>
</tr>
<tr>
<td></td>
<td>slc2</td>
<td>Very extensive efforts are made by my institution in selection.</td>
<td>4.804</td>
<td>1.557</td>
</tr>
<tr>
<td></td>
<td>slc3</td>
<td>The recruitment and selection processes in this institution are impartial.</td>
<td>4.637</td>
<td>1.554</td>
</tr>
<tr>
<td></td>
<td>slc4</td>
<td>Only the best people are hired to work in this institution.</td>
<td>4.488</td>
<td>1.660</td>
</tr>
<tr>
<td>Internal Career Ladders</td>
<td>ldr1</td>
<td>Individuals in this job have clear career paths within the institution.</td>
<td>4.445</td>
<td>1.616</td>
</tr>
<tr>
<td></td>
<td>ldr2</td>
<td>Employees’ career aspirations within the institution are known by their immediate supervisors.</td>
<td>4.311</td>
<td>1.680</td>
</tr>
<tr>
<td></td>
<td>ldr3</td>
<td>Employees in this job who desire promotion have more than one potential position they could be promoted to.</td>
<td>4.106</td>
<td>1.685</td>
</tr>
<tr>
<td></td>
<td>ldr4</td>
<td>The promotion process used here is fair to all employees.</td>
<td>3.935</td>
<td>1.905</td>
</tr>
<tr>
<td>Training</td>
<td>trn1</td>
<td>Extensive training programs are provided for individuals in this job.</td>
<td>3.812</td>
<td>1.899</td>
</tr>
<tr>
<td></td>
<td>trn2</td>
<td>Employees in this job will normally go through training programs.</td>
<td>4.123</td>
<td>1.815</td>
</tr>
<tr>
<td></td>
<td>trn3</td>
<td>There are formal training programs to teach new hires the skills they need to perform their jobs.</td>
<td>4.317</td>
<td>1.774</td>
</tr>
<tr>
<td></td>
<td>trn4</td>
<td>Formal training programs are offered to employees in order to increase their promotability in this institution.</td>
<td>3.929</td>
<td>1.728</td>
</tr>
<tr>
<td>Performance Appraisal</td>
<td>aprz1</td>
<td>Performance is more often measured with objective, quantifiable results.</td>
<td>3.998</td>
<td>1.521</td>
</tr>
<tr>
<td></td>
<td>aprz2</td>
<td>Performance appraisals are based on objective, quantifiable results.</td>
<td>4.073</td>
<td>1.550</td>
</tr>
<tr>
<td></td>
<td>aprz3</td>
<td>Appraisals of my performance are fair and accurate.</td>
<td>4.537</td>
<td>1.643</td>
</tr>
<tr>
<td></td>
<td>aprz4</td>
<td>I receive regular and constructive feedback on how well I do my job.</td>
<td>4.461</td>
<td>1.663</td>
</tr>
<tr>
<td>Employee Voice and Participation</td>
<td>prt1</td>
<td>Employees in this job are allowed to make many decisions.</td>
<td>3.837</td>
<td>1.617</td>
</tr>
<tr>
<td></td>
<td>prt2</td>
<td>Employees in this job are often asked by their supervisor to participate in decisions.</td>
<td>4.288</td>
<td>1.649</td>
</tr>
<tr>
<td></td>
<td>prt3</td>
<td>Employees are provided the opportunity to suggest improvements in the way things are done.</td>
<td>4.797</td>
<td>1.635</td>
</tr>
<tr>
<td></td>
<td>prt4</td>
<td>Superiors keep open communications with employees in this job.</td>
<td>4.526</td>
<td>1.716</td>
</tr>
<tr>
<td></td>
<td></td>
<td></td>
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</tr>
<tr>
<td>--------------------------------</td>
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<td>-----</td>
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</tr>
<tr>
<td><strong>Incentives and Rewards</strong></td>
<td></td>
<td></td>
<td></td>
<td></td>
</tr>
<tr>
<td>rwr1</td>
<td>3.731</td>
<td>2.015</td>
<td></td>
<td></td>
</tr>
<tr>
<td>rwr2</td>
<td>3.455</td>
<td>1.891</td>
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</tr>
<tr>
<td>rwr3</td>
<td>3.676</td>
<td>1.990</td>
<td></td>
<td></td>
</tr>
<tr>
<td>rwr4</td>
<td>3.649</td>
<td>1.917</td>
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</tr>
</tbody>
</table>

**Job Rotation**

|     |     |
|--------------------------------|-----|-----|
| rot1                           | 5.322 | 1.577 |
| rot2                           | 5.359 | 1.524 |
| rot3                           | 5.422 | 1.510 |
| rot4                           | 5.489 | 1.552 |

**Broadly Defined Job**

|     |     |
|--------------------------------|-----|-----|
| dfn1                           | 4.971 | 1.485 |
| dfn2                           | 4.747 | 1.554 |
| dfn3                           | 4.812 | 1.624 |
| dfn4                           | 4.599 | 1.747 |

**Employee Outcomes**

<p>| | | |</p>
<table>
<thead>
<tr>
<th></th>
<th></th>
<th></th>
</tr>
</thead>
<tbody>
<tr>
<td><strong>Job Satisfaction</strong></td>
<td></td>
<td></td>
</tr>
<tr>
<td>jsts1</td>
<td>5.152</td>
<td>1.599</td>
</tr>
<tr>
<td>jsts2</td>
<td>4.560</td>
<td>1.675</td>
</tr>
<tr>
<td>jsts3</td>
<td>4.898</td>
<td>1.599</td>
</tr>
<tr>
<td>jsts4</td>
<td>4.814</td>
<td>1.578</td>
</tr>
</tbody>
</table>

**Commitment**

|     |     |
|--------------------------------|-----|-----|
| cmt1                           | 5.910 | 1.312 |
| cmt2                           | 5.516 | 1.440 |
| cmt3                           | 5.382 | 1.462 |
| cmt4                           | 5.098 | 1.611 |

**Trust**

|     |     |
|--------------------------------|-----|-----|
| trs1                           | 4.869 | 1.695 |
| trs2                           | 4.532 | 1.701 |
| trs3                           | 4.724 | 1.599 |

**Motivation**

<p>| | |
|     |     |
|--------------------------------|-----|-----|
| mtv1                           | 5.353 | 1.389 |
| mtv2                           | 5.428 | 1.229 |
| mtv3                           | 4.998 | 1.380 |
| mtv4                           | 5.061 | 1.428 |</p>
<table>
<thead>
<tr>
<th>Intention to Remain</th>
<th>rmn1</th>
<th>I would turn down a job with more pay in order to stay with my institution.</th>
<th>3.215</th>
<th>1.921</th>
</tr>
</thead>
<tbody>
<tr>
<td></td>
<td>rmn2</td>
<td>I plan to spend my career at this institution.</td>
<td>3.925</td>
<td>1.813</td>
</tr>
<tr>
<td></td>
<td>rmn3</td>
<td>I intend to stay at this institution for at least the next 12 months.</td>
<td>5.029</td>
<td>1.783</td>
</tr>
<tr>
<td></td>
<td>rmn4</td>
<td>I do not plan to look for a job outside of this institution in the next six months.</td>
<td>4.774</td>
<td>2.013</td>
</tr>
</tbody>
</table>

<table>
<thead>
<tr>
<th>Service Climate</th>
<th>sc1</th>
<th>I have knowledge of the job and the skills to deliver superior quality work and service.</th>
<th>5.148</th>
<th>1.271</th>
</tr>
</thead>
<tbody>
<tr>
<td></td>
<td>sc2</td>
<td>I receive recognition and rewards for the delivery of superior work and service.</td>
<td>3.649</td>
<td>1.720</td>
</tr>
<tr>
<td></td>
<td>sc3</td>
<td>The overall quality of service provided by me to customers is excellent.</td>
<td>4.702</td>
<td>1.422</td>
</tr>
<tr>
<td></td>
<td>sc4</td>
<td>I am provided with the necessary resources to support the delivery of quality work and service.</td>
<td>4.843</td>
<td>1.520</td>
</tr>
</tbody>
</table>

<table>
<thead>
<tr>
<th>Customer Satisfaction</th>
<th>csts1</th>
<th>I think that our customers are satisfied with our services generally.</th>
<th>4.770</th>
<th>1.329</th>
</tr>
</thead>
<tbody>
<tr>
<td></td>
<td>csts2</td>
<td>I think that our customers are provided with high-quality service.</td>
<td>4.988</td>
<td>1.301</td>
</tr>
<tr>
<td></td>
<td>csts3</td>
<td>I think that our customers feel pleased with our institution.</td>
<td>4.860</td>
<td>1.275</td>
</tr>
</tbody>
</table>

Note: N = 521, SD = Standard Deviation
5.3 Data Screening and Preparation

Data preparation and screening were conducted before the SEM analysis. In the following subsections, the results are discussed.

5.3.1 Data screening

The data were screened for missing values, outliers and normality (skewness and kurtosis). Regarding missing values, eight variables were found with no missing values, and 57 variables had fewer than five per cent missing values. Out of these 57 variables, 38 had less than two per cent missing values, and for the remaining 19 variables, the maximum missing was 4.2 per cent for two items (prt2) and (rwr4). According to Hair et al. (2017), missing values of less than five per cent is considered within reasonable limits and causes only slightly different results for the PLS-SEM estimations in general. Thus, all missing values have been replaced and imputed based on all values for each variable using the median to make sense of the scale as these variables are ordinal and measured on a 7-point Likert scale (Gaskin, 2016).

In another step, the data were screened for outliers. An outlier is an extreme response by the participant to any or all questions (Hair et al., 2018). It could also represent a unique subcategory of the sample (Hair et al., 2018). In the current study, all the variables were measured using a 7-point Likert scale, so outliers were expected as some participants could have an extreme or different opinion regarding a particular question by choosing the number 1 or 7 as their answer. Thus, to detect outliers in the present study, the Mahalanobis distance measure was used. The results revealed several observations of extreme outliers. However, the outliers have been retained to avoid limiting the generalisability of the entire population (Hair et al., 2016) and taking into account that the presence of some extreme values in a large sample, as in the current study, is not a big issue, according to Kline (2005).

Finally, the results of the normality test revealed, as shown in Table 5.4, that the variables’ skewness and kurtosis values lie within -2 to 2, which is, according to George and Mallery (2010), within the acceptable range limit. One item (cmt1) has a kurtosis value of 2.736. However, it is still within the acceptable statistical limits as Byrne (2010, p. 103) argued that data is considered to be normal if kurtosis is between -3.0 to 3.0 or even equal to or greater than 7. Also, as advised by Hair et al., (2017) and Cain, Zhang and Yuan (2017), the normality multivariate skewness and kurtosis should be assessed (cut off: Mardia multivariate—skewness ±1, kurtosis ±20) . The results showed that the data was not multivariate normal,
Mardia’s multivariate skewness ($\beta = 20.489, p<0.01$) and Mardia’s multivariate kurtosis ($\beta = 302.646, p<0.01$), thus the SmartPLS employed to analyse the data in this study as it is a non-parametric analysis software.

**Table 5.4: Assessment of Normality**

<table>
<thead>
<tr>
<th>Variables</th>
<th>Items</th>
<th>Skewness</th>
<th>Kurtosis</th>
</tr>
</thead>
<tbody>
<tr>
<td>Recruitment and Selection</td>
<td>slc1</td>
<td>-0.541</td>
<td>-0.418</td>
</tr>
<tr>
<td></td>
<td>slc2</td>
<td>-0.571</td>
<td>-0.439</td>
</tr>
<tr>
<td></td>
<td>slc3</td>
<td>-0.470</td>
<td>-0.301</td>
</tr>
<tr>
<td></td>
<td>slc4</td>
<td>-0.468</td>
<td>-0.601</td>
</tr>
<tr>
<td></td>
<td>Construct</td>
<td>-0.566</td>
<td>-0.089</td>
</tr>
<tr>
<td>Internal Career Ladders</td>
<td>ldr1</td>
<td>-0.665</td>
<td>-0.431</td>
</tr>
<tr>
<td></td>
<td>ldr2</td>
<td>-0.466</td>
<td>-0.712</td>
</tr>
<tr>
<td></td>
<td>ldr3</td>
<td>-0.227</td>
<td>-0.865</td>
</tr>
<tr>
<td></td>
<td>ldr4</td>
<td>-0.186</td>
<td>-1.165</td>
</tr>
<tr>
<td></td>
<td>Construct</td>
<td>-0.495</td>
<td>-0.350</td>
</tr>
<tr>
<td>Training</td>
<td>trn1</td>
<td>-0.046</td>
<td>-1.197</td>
</tr>
<tr>
<td></td>
<td>trn2</td>
<td>-0.331</td>
<td>-1.083</td>
</tr>
<tr>
<td></td>
<td>trn3</td>
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<td>-0.881</td>
</tr>
<tr>
<td></td>
<td>trn4</td>
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<td></td>
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<tr>
<td>Employee Voice and Participation</td>
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<td>prt2</td>
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<td>prt4</td>
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</tr>
<tr>
<td>Incentives and Rewards</td>
<td>rwr1</td>
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<td>-1.256</td>
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<tr>
<td></td>
<td>rwr2</td>
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<td>rwr4</td>
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<tr>
<td></td>
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<td>rot4</td>
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<td>Broadly Defined Job</td>
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<td>-----------------</td>
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<tr>
<td></td>
<td>Construct</td>
<td>Construct</td>
<td>-0.652</td>
</tr>
</tbody>
</table>

### 5.3.2 Assessment of common method bias

The current study employed PLS-SEM to analyse the data. Thus, a full collinearity test was performed as a statistical check to detect and control CMB. According to Kock (2015), this test is more powerful in the identification of CMB than the standard criteria of the convergent and discriminant validity assessment based on a confirmation factor analysis. A model is considered to be contaminated by CMB if all VIFs resulting from a full collinearity test are
greater than 3.3; otherwise, the model can be considered free of CMB (Kock and Lynn, 2012; Kock, 2015). Next, the PLS algorithm factor test was conducted by connecting all variables to one variable at a time to check its inner VIF values. All the independent and dependent variables were tested, and all the VIF values were less than 3.3. Therefore, the model is considered to be free of CMB, and it is not likely to be an issue in the analysis.

5.3.3 Assessment of multigroup invariance

Since the research sample was collected from ministerial and non-ministerial departments, the multigroup invariance was tested via the MICOM procedure recommended by Hair et al. (2018). When measurement invariance is established, the group differences in the model estimates may be assumed with confidence not to result from the distinctive content and or meanings of the constructs across groups; rather, they represent actual differences in the structural relationships (Hair et al., 2018). The MICOM procedure includes three steps: assessment of configural invariance, of compositional invariance, and of the equality of composite mean values and variances (Hair et al., 2018). When the configural invariance (Step 1) and the compositional invariance (Step 2) are confirmed, then the multigroup analysis is feasible because partial measurement invariance is established (Hair et al., 2018). The results of the MICOM procedure for the current study are presented below.

**Step 1: Configural Invariance**

Configural invariance is established when all constructs have identical indicators across the groups, the same data treatment and identical algorithm settings (Hair et al., 2018). Thus, as all of the mentioned requirements were met, configural invariance was established.

**Step 2: Compositional Invariance**

When the composite scores are the same across the groups, then compositional invariance is established (Hair et al., 2018). The results of Step 2 of the MICOM revealed that compositional invariance was established for all variables, as shown in Table 5.5. Thus, by establishing configural invariance (Step 1) and compositional invariance (Step 2), partial measurement invariance was established.
Table 5.5: Summary of the MICOM Results* (Step 2)

<table>
<thead>
<tr>
<th>Composite</th>
<th>Correlation $c$</th>
<th>$5%$ quantile of the empirical distribution of $c_u$</th>
<th>p-value</th>
<th>Compositional invariance established?</th>
</tr>
</thead>
<tbody>
<tr>
<td>Broadly Defined Job</td>
<td>0.999</td>
<td>0.999</td>
<td>0.284</td>
<td>Yes</td>
</tr>
<tr>
<td>Commitment</td>
<td>0.999</td>
<td>0.999</td>
<td>0.216</td>
<td>Yes</td>
</tr>
<tr>
<td>Customer Satisfaction</td>
<td>1</td>
<td>0.999</td>
<td>0.769</td>
<td>Yes</td>
</tr>
<tr>
<td>Employee Voice and Participation</td>
<td>0.998</td>
<td>0.998</td>
<td>0.071</td>
<td>Yes</td>
</tr>
<tr>
<td>Incentives and Rewards</td>
<td>1</td>
<td>1</td>
<td>0.468</td>
<td>Yes</td>
</tr>
<tr>
<td>Intention to Remain</td>
<td>1</td>
<td>0.994</td>
<td>0.797</td>
<td>Yes</td>
</tr>
<tr>
<td>Internal Career Ladders</td>
<td>1</td>
<td>0.998</td>
<td>0.941</td>
<td>Yes</td>
</tr>
<tr>
<td>Job Rotation</td>
<td>0.999</td>
<td>0.998</td>
<td>0.267</td>
<td>Yes</td>
</tr>
<tr>
<td>Job Satisfaction</td>
<td>1</td>
<td>1</td>
<td>0.828</td>
<td>Yes</td>
</tr>
<tr>
<td>Motivation</td>
<td>0.999</td>
<td>0.986</td>
<td>0.605</td>
<td>Yes</td>
</tr>
<tr>
<td>Performance Appraisal</td>
<td>0.999</td>
<td>0.999</td>
<td>0.156</td>
<td>Yes</td>
</tr>
<tr>
<td>Recruitment and Selection</td>
<td>0.997</td>
<td>0.996</td>
<td>0.117</td>
<td>Yes</td>
</tr>
<tr>
<td>Service Climate</td>
<td>0.989</td>
<td>0.963</td>
<td>0.484</td>
<td>Yes</td>
</tr>
<tr>
<td>Training</td>
<td>1</td>
<td>0.999</td>
<td>0.635</td>
<td>Yes</td>
</tr>
<tr>
<td>Trust</td>
<td>1</td>
<td>0.999</td>
<td>0.831</td>
<td>Yes</td>
</tr>
</tbody>
</table>

* Setting: 1000 permutations and two-tailed testing with a significance level of 0.05.

Step 3: Equality of Composite Mean Values and Variances

In this step, after partial measurement invariance was established in Step 2, the assessment of the equality of composite mean values and variances was conducted using the pooled or aggregated data to check if full measurement invariance could be established also. The results of Step 3 of the MICOM revealed that full measurement invariance was not confirmed, as shown in Tables 5.6 and 5.7. However, the MICOM results for Step 2 were sufficient to support the feasibility of multigroup analysis as partial measurement invariance was established (Hair et al., 2018).

Table 5.6: Summary of the MICOM Results (Step 3, for mean values)

<table>
<thead>
<tr>
<th>Composite</th>
<th>Difference of the composite's mean value ($=0$)</th>
<th>95% confidence interval</th>
<th>p-value</th>
<th>Equal mean values?</th>
</tr>
</thead>
<tbody>
<tr>
<td>Broadly Defined Job</td>
<td>0.313</td>
<td>[-0.190; 0.198]</td>
<td>-</td>
<td>No</td>
</tr>
<tr>
<td>Commitment</td>
<td>0.077</td>
<td>[-0.193; 0.192]</td>
<td>0.432</td>
<td>Yes</td>
</tr>
<tr>
<td>Customer Satisfaction</td>
<td>0.176</td>
<td>[-0.195; 0.190]</td>
<td>0.070</td>
<td>Yes</td>
</tr>
<tr>
<td>Employee Voice and Participation</td>
<td>0.152</td>
<td>[-0.199; 0.190]</td>
<td>0.126</td>
<td>Yes</td>
</tr>
<tr>
<td>Incentives and Rewards</td>
<td>0.022</td>
<td>[-0.183; 0.197]</td>
<td>0.815</td>
<td>Yes</td>
</tr>
<tr>
<td>Composite</td>
<td>Logarithm of the composite's variances (=0)</td>
<td>95% confidence interval</td>
<td>p-value</td>
<td>Equal variances?</td>
</tr>
<tr>
<td>-----------------------------------</td>
<td>---------------------------------------------</td>
<td>--------------------------</td>
<td>---------</td>
<td>------------------</td>
</tr>
<tr>
<td>Broadly Defined Job</td>
<td>-0.246</td>
<td>[-0.265; 0.305]</td>
<td>0.098</td>
<td>Yes</td>
</tr>
<tr>
<td>Commitment</td>
<td>-0.386</td>
<td>[-0.352; 0.353]</td>
<td>0.031</td>
<td>No</td>
</tr>
<tr>
<td>Customer Satisfaction</td>
<td>0.001</td>
<td>[-0.292; 0.323]</td>
<td>0.994</td>
<td>Yes</td>
</tr>
<tr>
<td>Employee Voice and Participation</td>
<td>-0.311</td>
<td>[-0.266; 0.272]</td>
<td>0.021</td>
<td>No</td>
</tr>
<tr>
<td>Incentives and Rewards</td>
<td>-0.183</td>
<td>[-0.177; 0.183]</td>
<td>0.047</td>
<td>No</td>
</tr>
<tr>
<td>Intention to Remain</td>
<td>-0.401</td>
<td>[-0.244; 0.232]</td>
<td>0.002</td>
<td>No</td>
</tr>
<tr>
<td>Internal Career Ladders</td>
<td>-0.274</td>
<td>[-0.225; 0.266]</td>
<td>0.029</td>
<td>No</td>
</tr>
<tr>
<td>Job Rotation</td>
<td>-0.206</td>
<td>[-0.334; 0.359]</td>
<td>0.224</td>
<td>Yes</td>
</tr>
<tr>
<td>Job Satisfaction</td>
<td>-0.355</td>
<td>[-0.281; 0.287]</td>
<td>0.018</td>
<td>No</td>
</tr>
<tr>
<td>Motivation</td>
<td>-0.424</td>
<td>[-0.317; 0.345]</td>
<td>0.012</td>
<td>No</td>
</tr>
<tr>
<td>Performance Appraisal</td>
<td>-0.034</td>
<td>[-0.259; 0.285]</td>
<td>0.806</td>
<td>Yes</td>
</tr>
<tr>
<td>Recruitment and Selection</td>
<td>-0.084</td>
<td>[-0.246; 0.300]</td>
<td>0.528</td>
<td>Yes</td>
</tr>
<tr>
<td>Service Climate</td>
<td>-0.310</td>
<td>[-0.253; 0.258]</td>
<td>0.012</td>
<td>No</td>
</tr>
<tr>
<td>Training</td>
<td>-0.081</td>
<td>[-0.209; 0.232]</td>
<td>0.460</td>
<td>Yes</td>
</tr>
<tr>
<td>Trust</td>
<td>-0.357</td>
<td>[-0.233; 0.276]</td>
<td>0.005</td>
<td>No</td>
</tr>
</tbody>
</table>

**Table 5.7: Summary of the MICOM Results (Step 3, for variances)**

5.4 Data Analysis

5.4.1 The procedure for applying PLS-SEM

PLS-SEM was used via SmartPLS software (v. 3.2.7) to empirically test the hypotheses. According to Hair et al. (2017), when a research study includes the application of SEM, it is crucial, as a first step, to prepare a path model to illustrate the variables that will be examined. The application of PLS-SEM in the current study followed the systematic procedure recommended by Hair et al. (2017), as shown in Chapter 4 and below.
5.4.1.1 Specifying the path model (Steps 1 and 2)

There are two elements in the path model: the structural model and the measurement model (Hair et al., 2018). The structural model describes the relationships between the latent variables and is also referred to as the inner model (Hair et al., 2018). The measurement model describes the relationships between the latent variables (constructs) and their indicators and is also referred to as the outer model (Hair et al., 2018). In the current research, the structural model has two constructs, and they are quite complicated (HPWS and employee outcomes). Therefore, they were operationalised at a higher level as second-order constructs that reflect a type of reflective-formative model in accordance with the recommendations of Jiang and Messersmith (2018). Thus, the lower-order components were summarised into a single multidimensional higher-order construct, which reduces model complexity and leads to greater parsimony (Hair et al., 2018). In the measurement model, all scales used to measure the lower-order components had been published and used in previous studies, as shown in Chapter 4. Both the structural and measurement models are illustrated in Figure 5.2.

5.4.1.2 Examination of data and PLS path model estimation (Steps 3 and 4)

In the previous section (5.3), the collected data were examined for missing data, suspicious response patterns, outliers and data distributions according to Step 3 of the procedure recommended by Hair et al. (2017). The results of the examination of the current data show that it is likely there is nothing considered to be an issue for the data analysis. Thus, the researcher proceeded to Step 4 and selected the PLS path model estimation according to the algorithmic options and parameter settings recommended by Hair et al. (2017). For the algorithmic options, the factor weighting scheme was selected for the measurement model and the path weighting scheme was selected for the structural model. The parameter settings were selected with a stop criterion of $(10^{-7})$ and (300) maximum iterations.

5.4.1.3 Assessing PLS-SEM results of the measurement model (Step 5)

The evaluation of the measurement model was based on three empirical measures, namely reliability, convergent validity and discriminant validity (Hair et al., 2018). There are two separate assessment processes for the measurement models: one for the reflectively measured construct and another for the formatively measured construct (Hair et al., 2018). The assessment of the reflective construct includes assessing internal consistency (i.e. Cronbach’s alpha and composite reliability should be higher than 0.70), convergent validity (i.e. indicator loading should be higher than 0.70 and AVE should be higher than 0.50) and discriminant
validity by using the HTMT ratio and the Fornell-Larcker criterion (Hair et al., 2018). The assessment of the formative constructs includes assessing content validity, construct validity (i.e. the significance and relevance of outer weights), and reliability (i.e. collinearity between indicators should be lower than 5) (Petter, Straub and Rai, 2007; Hair et al., 2017).

The present study integrates both formative and reflective constructs as well as the higher-order model or hierarchical component model (HCM). There are two higher-order constructs (HOCs) in the current study: HPWS and employee outcomes. Each HOC consists of several sub-dimensions called lower-order constructs (LOCs). The HCM will allow the examination of a more complex PLS path model that involves both the LOCs and the HOCs simultaneously, thus providing a better criterion for prediction of the broader constructs or the bandwidth-fidelity tradeoff, which will be valuable when spanning multiple domains and periods (Hair et al., 2018). Also, the PLS path model will become more parsimonious and easier to capture (Hair et al., 2018). The type of HCM in the current study is a reflective-formative HCM (Type II); the reflectively measured LOCs represent more general constructs in the HOC (Hair et al., 2018). Both HPWS and employee outcomes were operationalised as a reflective-formative HCM. There are eight individual HR practices (LOCs) that form HPWS (HOC) and five individual attitudes and behaviours (LOCs) that form the employee outcomes (HOC). Both LOCs were measured via their reflective indicators and then related formatively to the HOCs, as shown in Figure 5.2. The measurement of the PLS-SEM for the current HCM was developed using two steps recommended by Hair et al. (2018) and based on combining the repeated indicators approach and the two-stage approach. In the first step, all indicators of the LOCs were also assigned to the HOCs so that all indicators were used twice under this approach, which is called a repeated indicators approach (Lohmoller, 1989; Wold, 1982; Hair et al., 2018). In the next step, the obtained latent variable scores of the LOCs serve as manifest variables for the HOCs in the measurement model (Henseler and Chin, 2010; Hair et al., 2018). The following subsections will present the results of the evaluation of the measurement model of the current study.
Figure 5.2: The path model
5.4.1.3.1 Assessment of the reflective constructs

The reflective constructs or the LOCs were evaluated by assessing their internal consistency, convergent validity and discriminant validity (Hair et al., 2018). The internal consistency reliability was evaluated in the traditional way using Cronbach’s alpha; however, rho_A has been considered a better alternative recently for the estimation of reliability (Vehkalahti, Puntanen and Tarkkonen, 2006). Thus, in the current study, rho_A was used to assess the internal consistency reliability as well as the composite reliability, and their threshold value should be higher than 0.70 (Hair et al., 2018). Table 5.8 shows that the internal consistency reliability of all the reflective constructs is well above the threshold value of 0.7.

The convergent validity was evaluated first by the outer loading of the indicators, which should be statistically significant and higher than 0.70, and second by the AVE, which should be higher than 0.50 (Hair et al., 2018). Figures 5.3 and 5.4 show that all the loading of indicators is well above the threshold value of 0.70 and statistically significant with p < 0.001. Thus, convergent validity is confirmed.

Finally, the discriminant validity was assessed by two approaches: the Fornell-Larcker criterion and the HTMT ratio (Hair et al., 2017). Table 5.9 presents the results of the traditional discriminant validity assessment method using the Fornell-Lacker criterion, which has been confirmed for all the reflective LOCs as the square root of the AVE of each construct is higher than its highest correlation with any other construct (Hair et al., 2018). Also, the alternative approach proposed by Henseler, Ringle and Sarstedt (2015) to assess the discriminant validity in PLS-SEM by using the HTMT ratio revealed that all HTMT values were below the threshold value of 0.85 and the HTMT_inference criterion was below 1. Discriminant validity is thus established. Table 5.8 outlines the results summary for the reflective measurement model.
Figure 5.3: The loading of indicators
Figure 5.4: T-statistics of indicators
Table 5.8: Results Summary for the Reflective Measurement Model

<table>
<thead>
<tr>
<th>Construct (latent variable)</th>
<th>Scale</th>
<th>Loadings</th>
<th>T-statistics</th>
<th>Average Variance Extracted (AVE)</th>
<th>Composite Reliability</th>
<th>rho_A</th>
</tr>
</thead>
<tbody>
<tr>
<td>Recruitment and Selection</td>
<td>Reflective</td>
<td>Min: 0.785</td>
<td>***</td>
<td>0.644</td>
<td>0.879</td>
<td>0.817</td>
</tr>
<tr>
<td></td>
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<td>Max: 0.821</td>
<td></td>
<td></td>
<td></td>
<td></td>
</tr>
<tr>
<td>Internal Career Ladders</td>
<td>Reflective</td>
<td>Min: 0.718</td>
<td>***</td>
<td>0.604</td>
<td>0.858</td>
<td>0.786</td>
</tr>
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<td>Max: 0.830</td>
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<td></td>
<td></td>
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</tr>
<tr>
<td>Training</td>
<td>Reflective</td>
<td>Min: 0.798</td>
<td>***</td>
<td>0.704</td>
<td>0.905</td>
<td>0.863</td>
</tr>
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<td>Max: 0.859</td>
<td></td>
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</tr>
<tr>
<td>Performance Appraisal</td>
<td>Reflective</td>
<td>Min: 0.756</td>
<td>***</td>
<td>0.666</td>
<td>0.888</td>
<td>0.836</td>
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<tr>
<td></td>
<td></td>
<td>Max: 0.857</td>
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<td></td>
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<td></td>
</tr>
<tr>
<td>Employee Voice and Participation</td>
<td>Reflective</td>
<td>Min: 0.763</td>
<td>***</td>
<td>0.649</td>
<td>0.881</td>
<td>0.822</td>
</tr>
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<td>Max: 0.844</td>
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<td>Incentives and Rewards</td>
<td>Reflective</td>
<td>Min: 0.890</td>
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<td>0.948</td>
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</tr>
<tr>
<td>Job Rotation</td>
<td>Reflective</td>
<td>Min: 0.814</td>
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<td>0.940</td>
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</tr>
<tr>
<td>Broadly Defined Job</td>
<td>Reflective</td>
<td>Min: 0.815</td>
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<td>0.712</td>
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</tr>
<tr>
<td>Job Satisfaction</td>
<td>Reflective</td>
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<td>0.778</td>
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<tr>
<td>Commitment</td>
<td>Reflective</td>
<td>Min: 0.701</td>
<td>***</td>
<td>0.711</td>
<td>0.907</td>
<td>0.881</td>
</tr>
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<td>Trust</td>
<td>Reflective</td>
<td>Min: 0.802</td>
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<td>0.752</td>
<td>0.901</td>
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<tr>
<td>Motivation</td>
<td>Reflective</td>
<td>Min: 0.701</td>
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<td>0.572</td>
<td>0.842</td>
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</tr>
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<td>Max: 0.826</td>
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</tr>
<tr>
<td>Intention to Remain</td>
<td>Reflective</td>
<td>Min: 0.725</td>
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<td>0.804</td>
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<td></td>
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<td>Max: 0.839</td>
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<td>Customer Satisfaction</td>
<td>Reflective</td>
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<td>0.935</td>
<td>0.903</td>
</tr>
<tr>
<td></td>
<td></td>
<td>Max: 0.927</td>
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</table>

***p < 0.001
Table 5.9: Discriminant Validity through the Fornell-Larcker Criterion

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<th>2</th>
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<th>14</th>
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<tr>
<td>Commitment (2)</td>
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</tr>
<tr>
<td>Customer Satisfaction (3)</td>
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<td>0.843</td>
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<td></td>
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<td></td>
<td></td>
</tr>
<tr>
<td>Employee Voice and Participation (4)</td>
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<td>0.438</td>
<td>0.327</td>
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<td></td>
<td></td>
</tr>
<tr>
<td>Incentives and Rewards (5)</td>
<td>0.449</td>
<td>0.357</td>
<td>0.320</td>
<td>0.579</td>
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<td></td>
<td></td>
<td></td>
<td></td>
<td></td>
</tr>
<tr>
<td>Intention to Remain (6)</td>
<td>0.370</td>
<td>0.497</td>
<td>0.299</td>
<td>0.347</td>
<td>0.367</td>
<td></td>
<td></td>
<td></td>
<td></td>
<td></td>
<td></td>
<td></td>
<td></td>
<td></td>
</tr>
<tr>
<td>Internal Career Ladders (7)</td>
<td>0.540</td>
<td>0.380</td>
<td>0.329</td>
<td>0.545</td>
<td>0.555</td>
<td>0.382</td>
<td></td>
<td></td>
<td></td>
<td></td>
<td></td>
<td></td>
<td></td>
<td></td>
</tr>
<tr>
<td>Job Rotation (8)</td>
<td>0.461</td>
<td>0.326</td>
<td>0.209</td>
<td>0.303</td>
<td>0.296</td>
<td>0.165</td>
<td>0.265</td>
<td></td>
<td></td>
<td></td>
<td></td>
<td></td>
<td></td>
<td></td>
</tr>
<tr>
<td>Job Satisfaction (9)</td>
<td>0.467</td>
<td>0.620</td>
<td>0.359</td>
<td>0.416</td>
<td>0.349</td>
<td>0.441</td>
<td>0.394</td>
<td>0.239</td>
<td></td>
<td></td>
<td></td>
<td></td>
<td></td>
<td></td>
</tr>
<tr>
<td>Motivation (10)</td>
<td>0.472</td>
<td>0.482</td>
<td>0.574</td>
<td>0.439</td>
<td>0.374</td>
<td>0.380</td>
<td>0.442</td>
<td>0.273</td>
<td>0.405</td>
<td></td>
<td></td>
<td></td>
<td></td>
<td></td>
</tr>
<tr>
<td>Performance Appraisal (11)</td>
<td>0.565</td>
<td>0.335</td>
<td>0.316</td>
<td>0.589</td>
<td>0.557</td>
<td>0.331</td>
<td>0.639</td>
<td>0.333</td>
<td>0.365</td>
<td>0.448</td>
<td></td>
<td></td>
<td></td>
<td></td>
</tr>
<tr>
<td>Recruitment and Selection (12)</td>
<td>0.433</td>
<td>0.375</td>
<td>0.306</td>
<td>0.405</td>
<td>0.395</td>
<td>0.283</td>
<td>0.611</td>
<td>0.204</td>
<td>0.323</td>
<td>0.410</td>
<td>0.474</td>
<td></td>
<td></td>
<td></td>
</tr>
<tr>
<td>Training (13)</td>
<td>0.433</td>
<td>0.329</td>
<td>0.304</td>
<td>0.572</td>
<td>0.588</td>
<td>0.231</td>
<td>0.493</td>
<td>0.283</td>
<td>0.336</td>
<td>0.398</td>
<td>0.638</td>
<td>0.395</td>
<td></td>
<td></td>
</tr>
<tr>
<td>Trust (14)</td>
<td>0.566</td>
<td>0.657</td>
<td>0.434</td>
<td>0.558</td>
<td>0.491</td>
<td>0.539</td>
<td>0.537</td>
<td>0.310</td>
<td>0.608</td>
<td>0.556</td>
<td>0.512</td>
<td>0.433</td>
<td>0.453</td>
<td>0.867</td>
</tr>
</tbody>
</table>

Note: Square root of the AVE on diagonal.
5.4.1.3.2 Assessment of the formative constructs

In the current study, there is one formative LOC, namely service climate, and another thirteen formative scales produced by the two-stage approach used for developing the HOCs in the measurement model, as discussed in Subsection 5.4.1.3: eight scales for HPWS and five scales for employee outcomes. The assessment of these formative constructs includes assessing content validity and construct validity and evaluating reliability (Petter, Straub and Rai, 2007; Hair et al., 2017). The evaluation of the content validity focuses on how well a scale measures the supposed construct based on its theoretical definition and how well it captures the construct’s key facets (Rungtusanatham, 1998; Malhotra and Birks, 2007; Hair et al., 2016). As discussed in Chapter 4, the content validity of all scale items used was well established and published in previous studies. The examination of the construct validity is considered a more formal evaluation of scale validity as it assesses the significance and relevance of outer weights (Petter, Straub and Rai, 2007; Hair et al., 2017). Table 5.10 shows that the values of the outer weights of each construct’s indicators are relatively equal in their contribution to forming that construct. Also, the table shows that the outer weight of all indicators is statistically significant, with p < 0.001. Finally, the assessment of the reliability was conducted to examine multicollinearity. Table 5.10 shows that all the VIFs of the indicators were below the threshold value of 5, indicating sufficient construct reliability according to Petter, Straub and Rai (2007) and Hair et al. (2017).

Table 5.10: Results Summary for the Formative Measurement Model

<table>
<thead>
<tr>
<th>Construct</th>
<th>Scale</th>
<th>Indicators</th>
<th>Outer Weight</th>
<th>T-statistics</th>
<th>VIF</th>
</tr>
</thead>
<tbody>
<tr>
<td>HPWS</td>
<td>Formative</td>
<td>Recruitment and Selection</td>
<td>= 0.143</td>
<td>19.132***</td>
<td>1.658</td>
</tr>
<tr>
<td></td>
<td></td>
<td>Internal Career Ladders</td>
<td>= 0.161</td>
<td>26.448***</td>
<td>2.395</td>
</tr>
<tr>
<td></td>
<td></td>
<td>Training</td>
<td>= 0.177</td>
<td>25.578***</td>
<td>2.041</td>
</tr>
<tr>
<td></td>
<td></td>
<td>Performance Appraisal</td>
<td>= 0.182</td>
<td>27.599***</td>
<td>2.467</td>
</tr>
<tr>
<td></td>
<td></td>
<td>Employee Voice and Participation</td>
<td>= 0.170</td>
<td>25.272***</td>
<td>1.973</td>
</tr>
<tr>
<td></td>
<td></td>
<td>Incentives and Rewards</td>
<td>= 0.209</td>
<td>27.870***</td>
<td>1.941</td>
</tr>
<tr>
<td></td>
<td></td>
<td>Job Rotation</td>
<td>= 0.129</td>
<td>11.349***</td>
<td>1.298</td>
</tr>
<tr>
<td></td>
<td></td>
<td>Broadly Defined Job</td>
<td>= 0.181</td>
<td>25.225***</td>
<td>1.886</td>
</tr>
<tr>
<td>Employee Outcomes</td>
<td>Formative</td>
<td>Job Satisfaction</td>
<td>= 0.300</td>
<td>29.878***</td>
<td>1.877</td>
</tr>
<tr>
<td></td>
<td></td>
<td>Commitment</td>
<td>= 0.286</td>
<td>33.392***</td>
<td>2.140</td>
</tr>
<tr>
<td></td>
<td></td>
<td>Trust</td>
<td>= 0.250</td>
<td>29.888***</td>
<td>2.729</td>
</tr>
<tr>
<td></td>
<td></td>
<td>Motivation</td>
<td>= 0.216</td>
<td>18.160***</td>
<td>1.636</td>
</tr>
<tr>
<td></td>
<td></td>
<td>Intention to Remain</td>
<td>= 0.213</td>
<td>19.519***</td>
<td>1.511</td>
</tr>
<tr>
<td>Service Climate</td>
<td>Formative</td>
<td>sc1</td>
<td>= 0.222</td>
<td>4.799***</td>
<td>1.168</td>
</tr>
<tr>
<td></td>
<td></td>
<td>sc2</td>
<td>= 0.396</td>
<td>8.331***</td>
<td>1.389</td>
</tr>
<tr>
<td></td>
<td></td>
<td>sc3</td>
<td>= 0.527</td>
<td>10.018***</td>
<td>1.732</td>
</tr>
<tr>
<td></td>
<td></td>
<td>sc4</td>
<td>= 0.152</td>
<td>2.754***</td>
<td>1.731</td>
</tr>
</tbody>
</table>

***p < 0.001
5.4.1.4 Assessing PLS-SEM results of the structural model (Step 6)

The evaluation of the results of the structural model involves the examination of the constructs’ relationships and the model’s predictive capabilities (Hair et al., 2018). The main criteria for assessment are collinearity issues, the significance and relevance of the path coefficients, the level of the $R^2$ values, the $f^2$ effect size and the predictive relevance $Q^2$ (Hair et al., 2018). Also, the model fit could be assessed using PLS-SEM-based measures such as standardised root mean square residual (SRMR) and normed fit index (NFI). The goodness-of-fit index (GoF) is not applicable to formatively measured model (Hair et al., 2018).

**Step 1: Collinearity Assessment**

Table 5.11 shows that all VIF values of all sets of predictor constructs in the structural model are below the threshold of 5. Thus, there is no critical collinearity issue among the predictor constructs in the structural model.

<table>
<thead>
<tr>
<th>Table 5.11: VIF Values in the Structural Model</th>
</tr>
</thead>
<tbody>
<tr>
<td>Employee Outcomes</td>
</tr>
<tr>
<td>HPWS</td>
</tr>
<tr>
<td>Employee Outcomes</td>
</tr>
<tr>
<td>Service Climate</td>
</tr>
</tbody>
</table>

**Step 2: Structural Model Path Coefficients**

Table 5.12 shows that all path coefficients of the structural model are statistically significant, with $p < 0.001$. Looking at the relative importance of exogenous driver constructs, for example, for *customer satisfaction*, revealed that *service climate* is the most important, followed by *employee outcomes*. The next section will discuss the hypothesis testing in more detail.

<table>
<thead>
<tr>
<th>Table 5.12: Significance of the Structural Model Path Coefficients</th>
</tr>
</thead>
<tbody>
<tr>
<td>Employee Outcomes</td>
</tr>
<tr>
<td>HPWS</td>
</tr>
<tr>
<td>Employee Outcomes</td>
</tr>
<tr>
<td>Service Climate</td>
</tr>
</tbody>
</table>

***$p < 0.001$
**Step 3: Coefficient of Determination (R² Value)**

The R² values represent the amount of explained variance in the endogenous constructs in the structural model (Hair et al., 2018). Table 5.13 shows that the value of R² in the current study for service climate is the highest, with 0.524, followed by 0.503 for employee outcomes and 0.455 for customer satisfaction. According to Cohen (1992), an R² value equal to 0.12 or below indicates low, values between 0.13 to 0.25 indicate medium, and values of 0.26 or above indicate high effect size.

<table>
<thead>
<tr>
<th>Table 5.13: R² Values in the Structural Model</th>
</tr>
</thead>
<tbody>
<tr>
<td>Customer Satisfaction</td>
</tr>
<tr>
<td>Employee Outcomes</td>
</tr>
<tr>
<td>Service Climate</td>
</tr>
</tbody>
</table>

**Step 4: Effect Size f²**

The effect size f² measures the impact on the endogenous constructs when a specified exogenous construct is omitted from the structural model (Hair et al., 2018). According to Cohen (1988), f² values of 0.02, 0.15 and 0.35 represent small, medium, and large effects, respectively. Table 5.14 shows that HPWS has a large effect size of 1.012 on employee outcomes, while it has small effect sizes of 0.140 and 0.021 on service climate and customer satisfaction, respectively. Also, employee outcomes has a medium effect size of 0.181 on service climate and a small effect size of 0.100 on customer satisfaction. Finally, service climate has a medium effect size of 0.215 on customer satisfaction.

<table>
<thead>
<tr>
<th>Table 5.14: f² Values in the Structural Model</th>
</tr>
</thead>
<tbody>
<tr>
<td>Employee Outcomes</td>
</tr>
<tr>
<td>Employee Outcomes</td>
</tr>
<tr>
<td>Service Climate</td>
</tr>
</tbody>
</table>

**Step 5: Blindfolding and Predictive Relevance Q²**

Stone-Geisser’s Q² value is an indicator of a model’s predictive relevance (Hair et al., 2018). Values of Q² greater than zero indicate that the exogenous constructs have predictive relevance for the endogenous construct under consideration (Hair et al., 2018). Table 5.15 shows that all
three endogenous constructs are considerably above zero, which provides clear support for the model’s predictive relevance regarding the endogenous latent variables.

<table>
<thead>
<tr>
<th>Table 5.15: $Q^2$ Values in the Structural Model</th>
</tr>
</thead>
<tbody>
<tr>
<td>Customer Satisfaction</td>
</tr>
<tr>
<td>Employee Outcomes</td>
</tr>
<tr>
<td>Service Climate</td>
</tr>
</tbody>
</table>

Note: The omission distance of D = 7.

**Step 6: The Model Fit**

The assessment of the model fit is based on PLS-SEM measures such as standardised root mean square residual (SRMR) and normed fit index (NFI). The goodness-of-fit index (GoF) is not applicable to formatively measured models (Hair et al., 2018). The SRMR value for the current structural model is 0.047, indicating good fit as the threshold value should be less than 0.08 (Hair et al., 2018). Also, the NFI value is 0.917, which is higher than the threshold value of 0.9 (Byrne, 2010), indicating good fit as well.

**5.4.2 The structural model: Hypotheses testing**

To examine the hypotheses using the structural model, the full model was run with a bootstrapping procedure that used 5,000 randomly drawn samples with replacement, as shown in Figures 5.5 and 5.6. A set of three relationships—direct, mediating, and moderating—will be examined and presented in the following subsections.
Figure 5.5: The structural model (path coefficient)

Figure 5.6: The structural model (t-statistics)
5.4.2.1 Hypotheses testing: Direct relationships

Table 5.16 presents the results of testing the hypothesised direct relationships. The table also includes the path coefficients, $t$-values, the corresponding significance levels, the effect size, and the confidence interval.

Table 5.16: Results Summary for the Structural Model (The Direct Effects)

<table>
<thead>
<tr>
<th>Hypotheses and corresponding paths</th>
<th>Path coefficient</th>
<th>$T$-statistics</th>
<th>Decision</th>
<th>$f^2$</th>
<th>95% Confidence interval</th>
</tr>
</thead>
<tbody>
<tr>
<td>HPWS $\rightarrow$ Employee Outcomes</td>
<td>0.709</td>
<td>30.300***</td>
<td>H1a supported</td>
<td>1.012</td>
<td>[0.657, 0.750]</td>
</tr>
<tr>
<td>HPWS $\rightarrow$ Service Climate</td>
<td>0.366</td>
<td>7.164***</td>
<td>H1b supported</td>
<td>0.140</td>
<td>[0.260, 0.458]</td>
</tr>
<tr>
<td>HPWS $\rightarrow$ Customer Satisfaction</td>
<td>-0.161</td>
<td>2.758***</td>
<td>H1c not supported</td>
<td>0.021</td>
<td>[-0.285, -0.054]</td>
</tr>
<tr>
<td>Employee outcomes $\rightarrow$ Service Climate</td>
<td>0.417</td>
<td>8.283***</td>
<td>H2a supported</td>
<td>0.181</td>
<td>[0.316, 0.513]</td>
</tr>
<tr>
<td>Employee outcomes $\rightarrow$ Customer Satisfaction</td>
<td>0.359</td>
<td>5.816***</td>
<td>H2b supported</td>
<td>0.100</td>
<td>[0.240, 0.481]</td>
</tr>
<tr>
<td>Service Climate $\rightarrow$ Customer Satisfaction</td>
<td>0.497</td>
<td>9.717***</td>
<td>H3 supported</td>
<td>0.215</td>
<td>[0.389, 0.592]</td>
</tr>
</tbody>
</table>

***$p < 0.001$

**HPWS and Employee Outcomes**

Hypothesis 1a investigated the relationship between HPWS and the employee outcomes of job satisfaction, commitment, trust, motivation and intention to remain. It was hypothesised that there would be a positive relationship between HPWS and employee outcomes. The results demonstrated positive and significant paths from HPWS to employee outcomes ($\beta = 30.300$, path coefficient = 0.709) with a large effect size ($f^2$) of 1.012. Thus, Hypothesis 1a was supported.

**HPWS and Service Climate**

Hypothesis 1b investigated the relationship between HPWS and service climate. It was hypothesised that there would be a positive relationship between an HPWS and service climate. The results demonstrated positive and significant paths from HPWS to service climate ($\beta = 7.164$, path coefficient = 0.366), with a small effect size ($f^2$) of 0.140. Thus, Hypothesis 1b was supported.
HPWS and Customer Satisfaction

Hypothesis 1c investigated the relationship between HPWS and customer satisfaction. It was hypothesised that there would be a positive relationship between an HPWS and customer satisfaction. The results demonstrated negative and significant paths from HPWS to customer satisfaction (β = 2.758, path coefficient = -0.161). However, the effect size ($f^2$), according to Hair et al. (2017), is tiny, with a value of 0.021, demonstrating that there is a minimal impact of HPWS on customer satisfaction. Thus, Hypothesis 1c was not supported.

Employee Outcomes and Service Climate

Hypothesis 2a investigated the relationship between employee outcomes and service climate. It was hypothesised that there would be a positive relationship between employee outcomes and service climate. The results demonstrated positive and significant paths from employee outcomes to service climate (β = 8.283, path coefficient = 0.417), with a medium effect size ($f^2$) of 0.181. Thus, Hypothesis 2a was supported.

Employee Outcomes and Customer Satisfaction

Hypothesis 2b investigated the relationship between employee outcomes and customer satisfaction. It was hypothesised that there would be a positive relationship between employee outcomes and customer satisfaction. The results demonstrated positive and significant paths from employee outcomes to customer satisfaction (β = 5.816, path coefficient = 0.359), with a small effect size ($f^2$) of 0.100. Thus, Hypothesis 2b was supported.

Service Climate and Customer Satisfaction

Hypothesis 3 investigated the relationship between service climate and customer satisfaction. It was hypothesised that there would be a positive relationship between service climate and customer satisfaction. The results demonstrated positive and significant paths from service climate to customer satisfaction (β = 9.717, path coefficient = 0.497), with a medium effect size ($f^2$) of 0.215. Thus, Hypothesis 3 was supported.
5.4.2.2 Hypotheses testing: Mediating relationships

The bootstrap test approach proposed by Zhao, Lynch and Chen (2010) was used in the current study for mediation analysis. This approach has overcome the conceptual and methodological problems raised in the literature regarding the Baron and Kenny approach (1986) and the Sobel test (1982) for analysis of mediation (Hair et al., 2018). The bootstrap test approach was implemented using the SmartPLS software used to analyse the mediation in this study. According to Hair et al. (2017), this approach yields higher levels of statistical power compared to the Sobel test. The structural model of the current study evaluated the influence of the HPWS (exogenous construct) through two mediating variables (employee outcomes and service climate). This multiple analysis of mediation requires consideration of all mediators simultaneously in one model to obtain the full picture of the mechanism by which it has an effect, and that includes the specific indirect effects and the total indirect effect in the structural model (Hair et al., 2018). The mediation analysis for the current study includes four mediation paths. Table 5.17 presents the results of testing the specific indirect effects that reflect the hypothesised indirect relationships. The table also includes the path coefficients, t-values, the confidence interval, the corresponding significance levels and the mediation type. The four mediation paths tested were as follows.

Mediation Path 1: HPWS → Employee Outcomes → Customer Satisfaction

Hypothesis 4a examined the mediation of employee outcomes on the HPWS-customer satisfaction relationship. It was hypothesised that employee outcomes would mediate the relationship between HPWS and customer satisfaction. The results demonstrated a significant partial mediation path ($\beta = 5.591$, path coefficient = 0.255). Thus, Hypothesis 4a was supported.

Mediation Path 2: HPWS → Employee Outcomes → Service Climate

Hypothesis 4b examined the mediation of employee outcomes on the HPWS-service climate relationship. It was hypothesised that employee outcomes would mediate the relationship between HPWS and service climate. The results demonstrated a significant partial mediation path ($\beta = 7.907$, path coefficient = 0.295). Thus, Hypothesis 4b was supported.
**Mediation Path 3: HPWS → Service Climate → Customer Satisfaction**

Hypothesis 5 examined the mediation of service climate on the HPWS-customer satisfaction relationship. It was hypothesised that the service climate would mediate the relationship between HPWS and customer satisfaction. The results demonstrated a significant partial mediation path ($β = 6.001$, path coefficient = $0.182$). Thus, Hypothesis 5 was supported.

**Mediation Path 4: HPWS → Employee Outcomes → Service Climate → Customer Satisfaction**

Hypothesis 6 examined the mediation of employee outcomes and service climate on the HPWS-customer satisfaction relationship. It was hypothesised that employee outcomes and service climate would mediate the relationship between HPWS and customer satisfaction. The results demonstrated a significant partial mediation path ($β = 5.713$, path coefficient = $0.147$). Thus, Hypothesis 6 was supported.
Table 5.17: Summary of Path Coefficients and Significance Levels for Mediation Hypotheses (The Specific Indirect Effect)

<table>
<thead>
<tr>
<th>Hypotheses and corresponding paths</th>
<th>Path coefficient</th>
<th>T-statistics</th>
<th>Decision</th>
<th>95% Confidence interval</th>
<th>Mediation type</th>
</tr>
</thead>
<tbody>
<tr>
<td>HPWS → Employee Outcomes → Customer Satisfaction</td>
<td>0.255</td>
<td>5.591***</td>
<td>H4a supported</td>
<td>[0.166, 0.343]</td>
<td>Partial</td>
</tr>
<tr>
<td>HPWS → Employee Outcomes → Service Climate</td>
<td>0.295</td>
<td>7.907***</td>
<td>H4b supported</td>
<td>[0.227, 0.371]</td>
<td>Partial</td>
</tr>
<tr>
<td>HPWS → Service Climate → Customer Satisfaction</td>
<td>0.182</td>
<td>6.001***</td>
<td>H5 supported</td>
<td>[0.125, 0.244]</td>
<td>Partial</td>
</tr>
<tr>
<td>HPWS → Employee Outcomes → Service Climate → Customer Satisfaction</td>
<td>0.147</td>
<td>5.713***</td>
<td>H6 supported</td>
<td>[0.103, 0.201]</td>
<td>Partial</td>
</tr>
</tbody>
</table>

***p < 0.001
Table 5.18 shows the total indirect effect of the structural model. The total indirect path coefficient of HPWS via employee outcomes and service climate to customer satisfaction was positive and significant ($\beta = 12.514$, path coefficient $= 0.583$). It also predominated over the direct path, which was negative and significant ($\beta = 2.758$, path coefficient $= -0.161$). However, the direct paths from employee outcomes to customer satisfaction ($\beta = 5.816$, path coefficient $= 0.359$) and from HPWS to service climate ($\beta = 7.164$, path coefficient $= 0.366$) predominated over the total indirect paths from employee outcomes to customer satisfaction ($\beta = 5.970$, path coefficient $= 0.207$) and from HPWS to service climate ($\beta = 8.022$, path coefficient $= 0.295$).

<table>
<thead>
<tr>
<th>Indirect effects</th>
<th>Path coefficient</th>
<th>$T$-statistics</th>
<th>95% Confidence interval</th>
</tr>
</thead>
<tbody>
<tr>
<td>Employee Outcomes $\rightarrow$ Customer Satisfaction</td>
<td>0.207</td>
<td>5.970***</td>
<td>[0.145, 0.280]</td>
</tr>
<tr>
<td>HPWS $\rightarrow$ Customer Satisfaction</td>
<td>0.583</td>
<td>12.514***</td>
<td>[0.493, 0.676]</td>
</tr>
<tr>
<td>HPWS $\rightarrow$ Service Climate</td>
<td>0.295</td>
<td>8.022***</td>
<td>[0.227, 0.371]</td>
</tr>
</tbody>
</table>

***$p < 0.001$

5.4.2.3 Hypotheses testing: Moderating effects

As the configural invariance and the compositional invariance were confirmed and the measurement invariance established for the data of this study (see Section 5.3.3), multigroup analysis (PLS-MGA) was used to examine the moderating effect of agencification by determining whether there is any significant difference between ministerial and non-ministerial departments in the relationships (path coefficients) through which perceptions of an HPWS impacts employee outcomes and service climate and subsequent impacts on customer satisfaction. According to Hair et al. (2018), there are several approaches to multigroup analysis when comparing two groups of data, such as the parametric test (Keil et al., 2000), the PLS-MGA approach (Henseler, Ringle and Sinkovics, 2009) and the permutation test (Chin and Dibbern, 2010). The parametric test is a widely used approach in PLS-SEM studies (Hair et al., 2018). There are two versions of this test based on whether equal or unequal variance can be assumed. The Welch-Satterthwaite test can be used if the variances differ significantly (Sarstedt and Mooi, 2014). The second approach to multigroup analysis is the PLS-MGA approach (Henseler, Ringle and Sinkovics, 2009). It is a nonparametric approach based on a bootstrapping result that allows the testing of one-sided hypotheses only (Hair et al., 2018). The third approach is the permutation test, which is a nonparametric approach (Chin and
Dibbern, 2010). It randomly exchanges observations between data sets and recalculates the model for each permutation; therefore, it has proven to be well-performing across a wide range of conditions (Hair et al., 2018).

In the present study, the hypothesised moderating effects were tested via three methods: the parametric test, the Welch-Satterthwaite test and the permutation test. Table 5.19 presents the results of testing the hypothesised moderating effects. It is apparent from this table that the hypotheses (7a, 7b, 7c, 7d and 7e) were not supported as no significant differences were found between the path coefficients through which perceptions of an HPWS impacts employee outcomes and service climate and the subsequent impacts on customer satisfaction in the ministerial and non-ministerial departments in the Oman public sector.
### Table 5.19: Summary of the Results of PLS Multigroup Analysis

<table>
<thead>
<tr>
<th>Hypotheses and corresponding paths</th>
<th>Ministerial departments</th>
<th>Non-ministerial departments</th>
<th>P-value across methods</th>
<th>Hypothesis support</th>
</tr>
</thead>
<tbody>
<tr>
<td></td>
<td>Path coefficient</td>
<td>$T$-statistics</td>
<td>Path coefficient</td>
<td>$T$-statistics</td>
</tr>
<tr>
<td>HPWS → Employee Outcomes</td>
<td>0.699</td>
<td>25.530***</td>
<td>0.755</td>
<td>18.863***</td>
</tr>
<tr>
<td>HPWS → Service Climate</td>
<td>0.341</td>
<td>5.676***</td>
<td>0.378</td>
<td>4.054***</td>
</tr>
<tr>
<td>Employee outcomes → Service Climate</td>
<td>0.403</td>
<td>7.054***</td>
<td>0.480</td>
<td>5.074***</td>
</tr>
<tr>
<td>Employee outcomes → Customer Satisfaction</td>
<td>0.342</td>
<td>4.517***</td>
<td>0.396</td>
<td>3.557***</td>
</tr>
<tr>
<td>Service Climate → Customer Satisfaction</td>
<td>0.499</td>
<td>8.054***</td>
<td>0.554</td>
<td>6.103***</td>
</tr>
</tbody>
</table>

***p < 0.001, NS: not significant.
5.4.2.4 Control variables

Although this study is not intended to explain differences at the individual level, several control variables typically mentioned in the literature were included in determining their effect on the structural model. Thus, the structural model in this study was controlled for employees’ age, gender, job position, education and tenure. Also, it was controlled for the organisation’s size, age and name. Table 5.20 shows that most of these control variables had no significant relationship with the dependent variables in this study. There were only five control variables that had a significant relationship; however, their effect size was negligible as it was less than 0.02, indicating that there is no effect according to Hair et al. (2017). Consequently, they were excluded from the analysis.

Table 5.20: Effects of Control Variables on Dependent Variables

<table>
<thead>
<tr>
<th>Control variable effect</th>
<th>Path coefficient</th>
<th>T-statistics</th>
<th>( t^2 )</th>
<th>Relationship</th>
<th>Effect</th>
</tr>
</thead>
<tbody>
<tr>
<td>Employee age → Customer Satisfaction</td>
<td>-0.005</td>
<td>NS</td>
<td>-</td>
<td>None</td>
<td>None</td>
</tr>
<tr>
<td>Employee age → Employee outcomes</td>
<td>-0.072</td>
<td>NS</td>
<td>-</td>
<td>None</td>
<td>None</td>
</tr>
<tr>
<td>Employee age → Service Climate</td>
<td>0.035</td>
<td>NS</td>
<td>-</td>
<td>None</td>
<td>None</td>
</tr>
<tr>
<td>Gender → Customer Satisfaction</td>
<td>0.000</td>
<td>NS</td>
<td>-</td>
<td>None</td>
<td>None</td>
</tr>
<tr>
<td>Gender → Employee Outcomes</td>
<td>-0.004</td>
<td>NS</td>
<td>-</td>
<td>None</td>
<td>None</td>
</tr>
<tr>
<td>Gender → Service Climate</td>
<td>-0.002</td>
<td>NS</td>
<td>-</td>
<td>None</td>
<td>None</td>
</tr>
<tr>
<td>Job → Customer Satisfaction</td>
<td>-0.013</td>
<td>NS</td>
<td>-</td>
<td>None</td>
<td>None</td>
</tr>
<tr>
<td>Job → Employee outcomes</td>
<td>0.008</td>
<td>NS</td>
<td>-</td>
<td>None</td>
<td>None</td>
</tr>
<tr>
<td>Job → Service Climate</td>
<td>-0.009</td>
<td>NS</td>
<td>-</td>
<td>None</td>
<td>None</td>
</tr>
<tr>
<td>Level of education → Customer Satisfaction</td>
<td>-0.042</td>
<td>NS</td>
<td>-</td>
<td>None</td>
<td>None</td>
</tr>
<tr>
<td>Level of education → Employee outcomes</td>
<td>-0.007</td>
<td>NS</td>
<td>-</td>
<td>None</td>
<td>None</td>
</tr>
<tr>
<td>Level of education → Service Climate</td>
<td>0.023</td>
<td>NS</td>
<td>-</td>
<td>None</td>
<td>None</td>
</tr>
<tr>
<td>Organisation age → Customer Satisfaction</td>
<td>-0.044</td>
<td>NS</td>
<td>-</td>
<td>None</td>
<td>None</td>
</tr>
<tr>
<td>Organisation age → Employee Outcomes</td>
<td>-0.097</td>
<td>2.384*</td>
<td>0.011</td>
<td>Negative</td>
<td>None</td>
</tr>
<tr>
<td>Organisation name → Customer Satisfaction</td>
<td>-0.039</td>
<td>NS</td>
<td>-</td>
<td>None</td>
<td>None</td>
</tr>
<tr>
<td>Organisation name → Employee Outcomes</td>
<td>0.069</td>
<td>NS</td>
<td>-</td>
<td>None</td>
<td>None</td>
</tr>
<tr>
<td>Organisation name → Service Climate</td>
<td>-0.067</td>
<td>NS</td>
<td>-</td>
<td>None</td>
<td>None</td>
</tr>
<tr>
<td>Organisation size → Customer Satisfaction</td>
<td>0.104</td>
<td>2.59*</td>
<td>0.012</td>
<td>Positive</td>
<td>None</td>
</tr>
<tr>
<td>Organisation size → Employee Outcomes</td>
<td>0.070</td>
<td>1.97*</td>
<td>0.006</td>
<td>Positive</td>
<td>None</td>
</tr>
<tr>
<td>Organisation size → Service Climate</td>
<td>0.099</td>
<td>2.793**</td>
<td>0.013</td>
<td>Positive</td>
<td>None</td>
</tr>
<tr>
<td>Tenure → Customer Satisfaction</td>
<td>0.129</td>
<td>2.726**</td>
<td>0.014</td>
<td>Positive</td>
<td>None</td>
</tr>
<tr>
<td>Tenure → Employee Outcomes</td>
<td>-0.024</td>
<td>NS</td>
<td>-</td>
<td>None</td>
<td>None</td>
</tr>
<tr>
<td>Tenure → Service Climate</td>
<td>-0.059</td>
<td>NS</td>
<td>-</td>
<td>None</td>
<td>None</td>
</tr>
</tbody>
</table>

*p < 0.05, **p < 0.01, NS: not significant.
5.5 Summary

In this chapter, PLS-SEM was used to test the hypothesised relationships between the study constructs. The results revealed that HPWS had significant positive relationships with employee outcomes and service climate. However, it had a significant negative relationship with customer satisfaction, although the effect size of this relationship was negligible. Regarding mediation effects, the results revealed that employee outcomes partially mediated the relationship between HPWS and both service climate and customer satisfaction. Additionally, it was found that service climate partially mediated the relationship between HPWS and customer satisfaction. Regarding moderation effects, the results show no significant difference in the relationships through which perceptions of an HPWS impacts customer satisfaction between the ministerial and non-ministerial departments. Table 5.21 summarises the results of hypotheses testing. The discussion of the results of testing the hypotheses is presented in the next chapter.

Table 5.21: Summary of Hypotheses Testing Results

<table>
<thead>
<tr>
<th>Hypothesis</th>
<th>Hypothesised Relationship</th>
<th>Result</th>
</tr>
</thead>
<tbody>
<tr>
<td>1a</td>
<td>The HPWS is positively related to employee outcomes.</td>
<td>Supported</td>
</tr>
<tr>
<td>1b</td>
<td>The HPWS is positively related to service climate.</td>
<td>Supported</td>
</tr>
<tr>
<td>1c</td>
<td>The HPWS is positively related to customer satisfaction.</td>
<td>Not Supported</td>
</tr>
<tr>
<td>2a</td>
<td>Employee outcomes are positively related to service climate.</td>
<td>Supported</td>
</tr>
<tr>
<td>2b</td>
<td>Employee outcomes are positively related to customer satisfaction.</td>
<td>Supported</td>
</tr>
<tr>
<td>3</td>
<td>Service climate is positively related to customer satisfaction.</td>
<td>Supported</td>
</tr>
<tr>
<td>4a</td>
<td>Employee outcomes mediate the relationship between the HPWS and customer satisfaction.</td>
<td>Supported</td>
</tr>
<tr>
<td>4b</td>
<td>Employee outcomes mediate the relationship between the HPWS and service climate.</td>
<td>Supported</td>
</tr>
<tr>
<td>5</td>
<td>Service climate mediates the relationship between the HPWS and customer satisfaction.</td>
<td>Supported</td>
</tr>
<tr>
<td>6</td>
<td>Employee outcomes and service climate mediate the relationship between the HPWS and customer satisfaction.</td>
<td>Supported</td>
</tr>
<tr>
<td>7a</td>
<td>Agencification moderates the relationships between the HPWS and employee outcomes.</td>
<td>Not Supported</td>
</tr>
<tr>
<td>7b</td>
<td>Agencification moderates the relationships between the HPWS and service climate.</td>
<td>Not Supported</td>
</tr>
<tr>
<td>7c</td>
<td>Agencification moderates the relationships between employee outcomes and service climate.</td>
<td>Not Supported</td>
</tr>
<tr>
<td>7d</td>
<td>Agencification moderates the relationships between employee outcomes and customer satisfaction.</td>
<td>Not Supported</td>
</tr>
<tr>
<td>7e</td>
<td>Agencification moderates the relationships between service climate and customer satisfaction.</td>
<td>Not Supported</td>
</tr>
</tbody>
</table>
CHAPTER 6
DISCUSSION AND CONCLUSION

6.1 Introduction

This chapter discusses the key findings of the current study and its theoretical and practical implications. The empirical results of the data in the previous chapter will be discussed in the next section, followed by the conclusions of this research. The practical implications and contributions of this research will be discussed after that, and some limitations of this study will also be discussed. Finally, some suggestions are made regarding future research directions. Figure 6.1 shows the outline of this chapter.

Figure 6.1: Outline of Chapter 6
6.2 Discussion of the Results

The discussion of the results of this study is arranged according to the sequence of the research hypotheses addressed in the current thesis.

6.2.1. The First Hypothesis (H1a)

This hypothesis addressed the relationship between employee perceptions of the HPWS and employee outcomes in the Omani public sector. The results in Chapter 5 showed that the HPWS, which was composed of eight practices, namely recruitment and selection, internal career ladders, training, performance appraisal, employee voice and participation, incentives and rewards, job rotation and broadly defined jobs, has a significant, positive relationship with the employee outcomes, which were measured via job satisfaction, commitment, trust, motivation and intention to remain. The effect size of HPWS on employee outcomes is relatively large ($f^2 = 1.012$). Thus, the HPWS has large and positive effects on employee outcomes when applied in Omani public sector establishments. This result indicates that wider use of the HPWS in the public sector could potentially lead to more positive attitudes and behaviour from the employee side. These findings are consistent with the rationale of the RBV theory and the AMO model. According to the RBV theory, HPWSs are considered a source of competitive advantage that positively influence employee outcomes (Wright, Dunford and Snell, 2001; Shin and Konrad, 2017). The rationale for this association is that the HPWS is geared towards creating value, uniqueness, knowledge and skills for employees that are not readily imitated by others, which, in turn, generate better performance and competitive advantage for the organisation (Wright, Gardner and Moynihan, 2003; Zhang and Morris, 2014). Thus, the findings of this study support the argument that HPWSs help organisations achieve better performance outcomes by generating more motivated and committed employees (Datta, Guthrie and Wright, 2005; Boselie, Dietz and Boon, 2005; Cafferkey and Dundon, 2015; Shin and Konrad, 2017). When the organisation creates and uses an HPWS through a set of practices that generate and emulate the AMO model, it will contribute to the enhancement of employee outcomes (White and Bryson, 2018). The results showed that HPWS, designed in the current study through the AMO model, has been positively reflected in motivating employees and opening the door for participation in decision making within their organizations and also positively reflects employee satisfaction, commitment and trust in the organization, which catalyses their positive motivation towards achieving the objectives of the organization and developing the intention to continue within the institution. They are also consistent with
the results of research conducted in private and public sector institutions in Western contexts (e.g. Ang et al., 2013; Kehoe and Wright, 2013; García-Chas, Neira-Fontela and Castro-Casal, 2014; Gould-Williams et al., 2014; Fabi, Lacoursière and Raymond, 2015; Katou, 2017). Thus, the findings of the present study support the arguments of Gould-Williams and Mohamed (2010) and others that the effects of HPWSs are not limited to the private sector or exclusive to Anglo-Saxon countries but can also be observed in other labour markets and cultures around the world.

As for the Omani context, the results of this study showed a strong association between the HPWS and employee outcomes, refuting some of the claims in the literature regarding HRM practices in the Sultanate being ‘loosely connected to each other’ as indicated by Al-Jahwari and Budhwar (2016). If such practices were so weak and inconsistent, the results would not have been so strongly linked to the outcomes of the staff. The results also showed that some of the adverse effects raised in the literature on societal culture in the Omani context might be exaggerated, such as nepotism (e.g. Al-Hamadi, Budhwar and Shipton, 2007; Al-Jahwari and Budhwar, 2016; Budhwar et al., 2018). Employee outcomes reflect a strong positive relationship with the HPWS, indicating that staff convictions about these practices are generally positive and are also linked to their convictions that reflect overall satisfaction with their jobs, commitment and trust in their institutions, stimulating an atmosphere of motivation within those institutions.

6.2.2 The Second Hypothesis (H1b)

This hypothesis addressed the relationship between employee perceptions of the HPWS and service climate. The results of this study revealed that HPWSs have a significant, positive relationship with the service climate. The effect size of HPWS on service climate is classified as a small effect ($f^2 = 0.140$). Thus, the HPWS has a small and positive effect on service climate when applied in Omani public sector institutions. These results indicate that wider use of the HPWS in the public sector could potentially enhance the service climate. Further, the results are consistent with those of previous research conducted mostly in Western and Far East contexts (e.g. Zerbe, Dobni and Harel, 2009; Veld, Paauwe and Boselie, 2010; Tang and Tang, 2012; Jiang, Chuang and Chiao, 2015; Lin and Liu, 2016). Thus, the findings of the present study support the argument of Bowen and Ostroff (2004) that the HPWS affects the service climate because it has the effect of a signalling system that sends messages to employees about service delivery and what is expected, encouraged and rewarded by the organisation for
achieving customer satisfaction. When an HPWS improves employee capabilities, motivates them and enables them to perform, their overall performance will be improved by the creation of desirable positive behaviours which, in turn, will promote positive convictions about the service climate that will ultimately enhance the firm’s profitability (Dyer and Reeves, 1995; Kehoe and Wright, 2010; Hong et al., 2013; Michel, Kavanagh and Tracey, 2013). Thus, the HPWS has a positive impact on the service climate (Hong et al., 2013; Michel, Kavanagh and Tracey, 2013). To date, few studies have tried to address this relationship between the HPWS and service climate (Rogg et al., 2001; Gahan and Buttigieg, 2008; Heffernan et al., 2016). Thus, this study represents an extension of literature in this regard and supports the efforts of the academic community in its quest to build a service climate theory.

For the Omani context, HPWS again demonstrated, through the results of this study, the importance of its role in creating a service climate in public sector institutions, which are primarily institutions serving the public. Therefore, a high service climate in this service sector undoubtedly enhances opportunities for customer satisfaction, which is the nominal objective of this sector. These results certainly encourage public sector officials and decision makers to continue investing in the HPWS. The SEM analysis demonstrates the strong positive relationship between HPWS and both staff outcomes and the service climate, both of which are key to the success of any service organisation; where the quality of service and direct communication between employees and end users is critical to achieving this success.

6.2.3 The Third Hypothesis (H1c)

This hypothesis addressed the relationship between employee perceptions of the HPWS and customer satisfaction in the Omani public sector. The results in Chapter 5 did not support the positive impact hypothesis of HPWS on customer satisfaction. Also, the results showed that the HPWS has a significant, negative relationship with customer satisfaction. However, the effect size ($f^2$), according to Hair et al. (2017), is tiny, with a value of 0.021, demonstrating that there is a minimal impact of HPWS on customer satisfaction. The results of this research, as discussed above, demonstrate the positive impact of the HPWS on employee outcomes and service climate, while the impact on customer satisfaction is virtually non-existent, reinforcing the premise that the relationship between HPWS and customer satisfaction is indirect. Thus, the findings of the current study provided support for the indirect relationship mechanism between the HPWS and organisational performance. This mechanism through which the HPWS influence organisational performance remains a gap in the literature that is often
referred to as the ‘black box’ (Takeuchi et al., 2007; Messersmith et al., 2011; Kloutsiniotis and Mihail, 2018). Focusing on the intervening mechanisms could expand our understanding of how this influence occurs (Innocenti, Pilati and Peluso, 2011; Van de Voorde and Beijer, 2015; Kloutsiniotis and Mihail, 2018). Thus, this study, which examined the indirect relationship between employee perceptions of HPWS and customer satisfaction through the intermediary role of employee outcomes and the service climate as discussed later in this section, is an important addition to literature and will contribute to the building of a theory on this relationship.

6.2.4 The Fourth Hypothesis (H2a)

This hypothesis addressed the relationship between employee outcomes and service climate. The results in Chapter 5 revealed that employee outcomes had a significant, positive relationship with service climate. The effect size of HPWS on employee outcomes is medium ($f^2 = 0.181$). Thus, employee outcomes have a medium and positive effect on service climate when applied in Omani public sector institutions. This finding indicates that when employee outcomes (job satisfaction, commitment, trust, motivation and intention to remain) are more positive, improvement of the service climate is highly expected. When an HPWS improves employee capabilities, motivates them and enables them to perform, their overall performance will be improved by the creation of desirable positive behaviours which, in turn, will promote positive convictions about the service climate that will ultimately enhance the firm’s profitability (Dyer and Reeves, 1995; Kehoe and Wright, 2010; Hong et al., 2013; Michel, Kavanagh and Tracey, 2013). Bowen and Schneider (2014), emphasise the critical role of employee engagement as a foundational base of the service climate. They argue that ‘a service climate most likely can exist when the employees in an organisation are engaged in their work’. Schneider, Macey, Barbera, et al. (2009) encouraged all organisations to start engaging their workers if they do not want to lose their customers and market share. Also, the findings are consistent with the rationale of social exchange theory. They are also consistent with the results of previous research conducted mostly in Western contexts (e.g. Salanova, Agut and Peiró, 2005; Vigoda-Gadot and Meiri, 2008; Yavas, Babakus and Ashill, 2010; Veloso et al., 2015). Thus, the findings of the present study support the argument of Saks (2006) and Bowen and Schneider (2014) regarding the crucial role of employee outcomes as an antecedent of the service climate, which will support the efforts of the academic community in its quest to build a service climate theory.
As for the Omani context, the results of this study showed that the outcomes of employee have an important role in enhancing the service climate in the public sector institutions. This will draw the attention of public sector officials to the importance of monitoring these outcomes and working to increase all that encourages and stimulates employee satisfaction, commitment and trust in their institutions. Because by doing so, these institutions can create a strong service climate that enhances the chances of achieving customer satisfaction at the end of the day.

6.2.5 The Fifth Hypothesis (H2b)

This hypothesis addressed the relationship between employee outcomes and customer satisfaction. Consistent with the findings of previous research (e.g. Rogg et al., 2001; Baluch, Salge and Piening, 2013; Khatri, Gupta and Varma, 2017), the results of this study revealed that employee outcomes had a significant, positive relationship with customer satisfaction. The effect size of employee outcomes on customer satisfaction is small ($f^2 = 0.100$). Thus, employee outcomes have a small and positive effect on customer satisfaction when applied in the context of the public sector in Oman. This finding indicates that when employee outcomes (job satisfaction, commitment, trust, motivation and intention to remain) are more positive, then customer satisfaction is highly expected. The findings of the present study support the argument of many academics that having employees with positive attitudes and behaviour will inevitably lead to customer satisfaction (Hartline and Ferrell, 1996; Hallowell, Schlesinger and Zornitsky, 1996; Ennis and Harrington, 2001; Babakus, Bienstock and Van Scotter, 2004; Yee, Yeung and Cheng, 2008; Lee, Lee and Kang, 2012; Kloutsiniotis and Mihail, 2018). These findings are also consistent with the rationale of social exchange theory. According to the theory of social exchange, employees will appreciate the institution investing in them through the use of the HPWS. Moreover, thus, will exchange for this investment by showing a higher number of positive attitudes and behaviours, which are an essential means to achieve customer satisfaction. When a customer connects with an employee who has a great deal of positive attitude in his behaviour, he will probably make the most effort to achieve customer satisfaction by providing a high-quality service. Thus, the reciprocal relationship between workers and employers will contribute to enhancing organisational performance (Takeuchi et al., 2007; Messersmith et al., 2011; Jiang and Messersmith, 2018). Many academics argue that engagement of satisfied employees leads to service quality and, in turn, to customer satisfaction (Hartline and Ferrell, 1996; Hallowell, 1996; Ennis and Harrington, 2001; Babakus, Bienstock and Van Scotter, 2004; Yee, Yeung and Cheng, 2008; Lee, Lee and Kang, 2012).
As for the Omani context, the results of this study showed that employee outcomes have an important role in enhancing customer satisfaction in public sector institutions. Therefore, public sector officials must pay attention to these outcomes and work to increase all that encourages and stimulates employee satisfaction, commitment and trust in their institutions. Because by doing so, these institutions can simply achieve customer satisfaction.

6.2.6 The Sixth Hypothesis (H3)

This hypothesis addressed the relationship between service climate and customer satisfaction. The findings of the current study revealed that service climate had a significant, positive relationship with customer satisfaction. The effect size of service climate on customer satisfaction is medium ($f^2 = 0.215$). Thus, service climate has a medium and positive effect on customer satisfaction when applied in the context of the public sector in Oman. This finding indicates that when employees perceive a strong service climate, this should lead to satisfied customers. This is consistent with the findings of previous studies (e.g. Mayer, Ehrhart and Schneider, 2009; Schneider, Macey, Lee, et al., 2009; Martínez-Tur et al., 2011; Auh et al., 2011; Lin and Liu, 2016). In addition, these findings are consistent with the rationale of the argument of Bowen and Ostroff (2004) that the HPWS affects the service climate because it has the effect of a signalling system that sends messages to employees about service delivery and what is expected, encouraged and rewarded by the organisation for achieving customer satisfaction. Thus, For employees who are in contact with customers, a positive service climate is important because it ensures that customer expectations are met by the provided service (Schneider and White, 2004; Michel, Kavanagh and Tracey, 2013).

As for the Omani context, the results of this study showed that the service climate plays a vital role in enhancing customer satisfaction in public sector institutions. Therefore, public sector officials should pay attention to promoting this climate by investing in the HPWS. Which, as mentioned above, has a significant positive impact on the formation of a strong service climate in the institutions and enhancing the positive employee outcomes, all of which serve to achieve customer satisfaction.

6.2.7 The Seventh Hypothesis (H4a)

This hypothesis addressed the mediating effects of employee outcomes on the relationship between employees’ perceptions of the HPWS and customer satisfaction. Consistent with the findings of previous research (e.g. Rogg et al., 2001; Guest, 2001; Khatri, Gupta and Varma,
2017), the findings of the current study showed that employee outcomes had a partial mediating (competitive mediation) effect on the relationship between the HPWS and customer satisfaction. This demonstrates that HPWSs enhance positive employee attitudes and behaviours, which, in turn, positively influence end-user satisfaction. This finding supports the assumptions underlying the theory of social exchange, which assumes that when employees feel that their organisation is interested in investing in them by developing their skills and abilities and inventing ways to motivate them through the HPWS, the staff will appreciate it and tend to reciprocate by showing a lot of positive attitudes and behaviours. This creates a reciprocal relationship between workers and employers that contributes to enhancing organisational performance, resulting in customer satisfaction (Takeuchi et al., 2007; Messersmith et al., 2011; Jiang and Messersmith, 2018).

This hypothesis is the first hypothesis in this research that seeks to open the "black box" governing the mechanism of the relationship between HPWS and customer satisfaction. As shown above, the results show that employee outcomes play an important role in this relationship. This result gives an essential indication to policymakers in the public sector of the importance of enhancing employee outcomes through investment in HPWS. As the theory of social exchange suggests, employees will be in the process of mutual exchange with the institution. In exchange for the investment that the institution provides in its human resources through training, incentives and rewards, for example, the employees will, on the other hand, offer more positive attitudes and behaviours that will be reflected positively in the level of services provided and their quality. The result will, therefore, appear in customer satisfaction. This is one of the things that need to be taken into account in the Omani public sector. Some surveys indicate a decline in satisfaction with Government performance (National Center for Statistics and Information, 2019). Oman's public sector officials should take advantage of the findings of this study, which has shown a strong correlation showing that investment in HPWS will benefit both employees and customers. HPWS will improve employee outcomes and, in turn, improve customer satisfaction.

6.2.8 The Eighth Hypothesis (H4b)

This hypothesis addressed the mediating effects of employee outcomes on the relationship between employees’ perceptions of the HPWS and service climate. Consistent with the findings of previous research (e.g. Vigoda-Gadot and Meiri, 2008; Veloso et al., 2015), the findings of the current study showed that employee outcomes had a partial mediating (complementary
mediation) effect on the relationship between the HPWS and service climate. This demonstrates that HPWSs enhance positive employee attitudes and behaviours, which, in turn, lead to a favourable service climate and enhance it. Given the positive impact of the HPWS and its positive relationship with staff attitudes and behaviours, staff perceptions will promote a positive service climate in a reciprocal process with the organisation. These findings are consistent with the rationale of social exchange theory. The findings also support the argument of Bowen and Schneider (2014) regarding the role of employee outcomes in enhancing service climate. When an HPWS improves employee capabilities, motivates them and enables them to perform, their overall performance will be improved by the creation of desirable positive behaviours which, in turn, will promote positive convictions about the service climate that will ultimately enhance the firm’s profitability (Dyer and Reeves, 1995; Kehoe and Wright, 2010; Hong et al., 2013; Michel, Kavanagh and Tracey, 2013).

This hypothesis is the second hypothesis in this research that seeks to open the "black box" governing the mechanism of the relationship between HPWS and customer satisfaction. As shown above, the results show that employee outcomes play an important role in this relationship. This finding provides an essential indicator for policymakers on the importance of enhancing employee outcomes by investing in the HPWS. As the theory of social exchange suggests, staff will be in mutual exchange with the institution. In return for the investment, the organisation provides in its human resources, employees will, for their part, provide more positive attitudes and behaviours that are positively reflected in enhancing the organisation's service climate. As mentioned earlier above, public sector officials in the Sultanate should, in the light of the recent opinion polls that have shown a decline in satisfaction with government services (National Center for Statistics and Information, 2019), benefit from the results of this study, which showed that employee results play an essential role in promoting the service climate. Successful and adequate investment in the HPWS will improve the employee's outcomes and thus improve the service climate in the public sector enterprise.

6.2.9 The Ninth Hypothesis (H5)

This hypothesis addressed the mediating effects of service climate on the relationship between employees’ perceptions of the HPWS and customer satisfaction. Researchers’ efforts to study the ‘black box’ governing this relationship has recently shed light on the service climate as one of the potential variables that may affect and be influenced by this relationship (Lin and Liu, 2016). Consistent with the accumulated research evidence that HPWSs have a positive impact
on the service climate and thus on customer satisfaction (Hong et al., 2013; Michel, Kavanagh and Tracey, 2013), the findings of the current study showed that service climate had a partial mediating (competitive mediation) effect on the relationship between the HPWS and customer satisfaction. The findings of the current study support the argument of Bowen and Ostroff (2004) that organisations use an HPWS as a signalling system to send messages to their employees about service delivery and what is expected, encouraged and rewarded by the organisation for achieving customer satisfaction. Therefore, as expected when the institution invests in HPWS, this will enhance the service climate, which in turn will enhance customer satisfaction.

This hypothesis is the third hypothesis in this research that seeks to open the "black box" governing the mechanism of the relationship between HPWS and customer satisfaction. As shown above, the results show that the service climate plays a vital role in this relationship. This result encourages the public sector to invest in HPWS. This investment is a way to gain a competitive advantage by promoting a service climate, which in turn will increase customer satisfaction. This is important when applied in the public sector it will contribute to improving the quality of services because a robust service environment will make employees fully aware of what is required and should be done in order to achieve customer satisfaction in return for the appreciation and rewards or incentives for this performance.

6.2.10 The Tenth Hypothesis (H6)

This hypothesis addressed the mediating effects of both employee outcomes and service climate simultaneously on the relationship between employees’ perceptions of the HPWS and customer satisfaction. Both employee outcomes and service climate had a significant, positive relationship with both the HPWS and customer satisfaction, as mentioned above. The type of mediation effects of both employee outcomes and service climate is competitive mediation (partial mediation) (Hair et al., 2018), or what also referred to as inconsistent mediation (MacKinnon, Krull and Lockwood, 2000). This also suggests that both mediators (employee outcomes and service climate) act as suppressor variables (MacKinnon, Krull and Lockwood, 2000; Hair et al., 2017). According to Zhao, Lynch and Chen (2010), that might point to an omitted mediator in the direct path which ‘can be pursued in future research’. The results of the total indirect effect in the structural model revealed that the total indirect impact across the three paths through which employee outcomes and service climate influenced the relationship between the HPWS and customer satisfaction was positive and significant ($\beta = 12.514$, path
coefficient = 0.583). It also predominated over the direct path, which was negative and significant (β = 2.758, path coefficient = -0.161). These findings show the importance of the mediating role of these two variables in the HPWS-customer satisfaction link. They also indicate that when the HPWS improves employee capabilities, motivates and enables them to perform, their overall performance will be improved through the creation of desirable positive behaviours, which, in turn, will promote positive convictions about the service climate that will ultimately enhance the firm’s profitability (Dyer and Reeves, 1995; Kehoe and Wright, 2010; Hong et al., 2013; Michel, Kavanagh and Tracey, 2013). Thus, these findings are consistent with the rationale of social exchange theory and the argument of Bowen and Ostroff (2004). In addition, these findings support the argument put forward by many researchers that in order to open the ‘black box’, the intermediate mechanisms of the more proximal related variables need to be examined in order to better understand the mechanism of this relationship (Dyer and Reeves, 1995; Jiang, Lepak, Hu, et al., 2012; Issue and Held, 2015).

This hypothesis is the fourth hypothesis in this research that seeks to open the "black box" governing the mechanism of the relationship between HPWS and customer satisfaction. As described above, the role of mediation for both staff outcomes and service climate was examined at the same time. The results showed that they play an essential role in this relationship. This result positively encourages the public sector officials to invest in HPWS, which has demonstrated in this research the importance of its role in enhancing both employee outcomes and service climate, and both of which subsequently enhance customer satisfaction. This result is an important breakthrough in the ‘black box’. Four tracks of mediation between HPWS and customer satisfaction have been examined, all of which have emphasised the importance of this system in enhancing the organisational performance and service climate of Omani public sector organisations.

6.2.11 The Eleventh to Fifteenth Hypotheses (H7a – H7e)

These hypotheses addressed the moderating effect of agencification on the relationship between the HPWS and customer satisfaction in the two main categories of public sector entities in Oman: government ministries (type zero) and public authorities (type two). The moderating role of agencification examined via multigroup analysis (PLS-MGA) to identify if there might be any difference in the relationships through which perceptions of an HPWS impacts customer satisfaction. The results in Chapter 5 showed that there was no moderating effect on any of the links between HPWS, employee outcomes, service climate and customer satisfaction. These findings refute claims made by promoters of the idea of agencification that
they are contributing to enhancing the performance of public sector institutions through the implementation of this initiative. Further, these results provide justification to support the recent trend in the West towards rationing agencification, according to Verhoest et al. (2012). There has been no difference between ministerial and non-ministerial departments regarding how HPWSs affect customer satisfaction through a distinct impact on employee outcomes and service climate.

Thus, the results of this research did not support NPM’s claim that agencification is an effective way to make public bureaucratic institutions more effective in achieving customer satisfaction. The study, therefore, raised concerns about the persistence of many international organisations, such as the World Bank and IMF, in calling on governments to implement this trend, particularly in developing countries. The findings of this study may support the argument of some researchers that shifting blame away from politicians can be seen as one of the most potent motives behind agencification in many countries (Hood, 2011; Mortensen, 2016; Verhoest et al., 2012; Verhoest, 2017; Kleizen, Verhoest and Wynen, 2018). In fact, agencification has been adopted by many governments to ‘escape forward’ rather than deal with the major challenges facing the public sector, especially in developing countries. In many of these countries, the public sector suffers from the accumulation of many administrative, financial and organisational problems that have caused poor performance against the backdrop of high operating costs of this sector. For example, in Oman, the public sector suffers from administrative slackening and high salaries and wage costs, which account for almost 75 per cent of the country’s current civil budget. Since the cost of reforming this sector is expensive, there has been a tendency to establish new entities (public authorities) with financial and HRM autonomy. However, the results of this study show that the cost of the staff in these new entities is more than twice the cost of staff in the traditional ministries, and no significant differences were detected in the level of impact of the HPWS on either side (ministries vs public authorities) on employee outcomes, service climate and customer satisfaction. Thus, there is a need to focus attention on comprehensive administrative reform of the public sector aimed at addressing the causes of imbalance in the giant component of this sector, i.e. government ministries, and not jump over it by following the agencification recipe as a magic solution to the performance problem in this sector. This is also a warning sounded by other researchers (e.g. Verhoest, 2017; Hammerschmid et al., 2018).
6.3 Conclusions

The most prominent finding to emerge from this study is that it was able to open the black box by demonstrating four intermediate pathways of the HPWS impact mechanism on customer satisfaction. This study shows that the indirect relationship between HPWS and customer satisfaction through the role of both employee outcomes and the service climate is the key to opening the black box. Besides, the HPWS has proven to be one of the most likely sources of competitive advantage in public-sector organisations. The results clearly indicate that HPWSs have a direct impact on staff attitudes and behaviours and the service climate. The research has also shown that the mediating effect of employee outcomes and service climate on the relationship between the HPWS and customer satisfaction was a significant relationship. Furthermore, the employee outcomes were found to have both a direct and indirect effect on customer satisfaction via service climate. Thus, the HPWS, employee outcomes and service climate can be seen as independent but interrelated predictors of customer satisfaction in public sector institutions. Consequently, according to the current study, public-sector officials should seek to adopt and invest in an HPWS to enhance positive employee attitudes and behaviours and to facilitate favourable service climate that ultimately will enhance the level of customer satisfaction. On the other hand, the results of this research did not support NPM’s claim that agencification is an effective way to make public bureaucratic institutions more effective in achieving customer satisfaction. The study, therefore, raised concerns about the persistence of many international organisations, such as the World Bank and IMF, in calling on governments to implement this trend, particularly in developing countries.

In short, the results of this study provide many theoretical, practical and methodological implications for both SHRM theorists and practitioners as described below.

6.3.1 Theoretical implications

The findings of this study make several theoretical implications to the current literature.

First, this research provides support for theorists who promote the ‘best practices’ or universalistic approach (Pfeffer, 1994) rather than the best-fit approach (Schuler and Jackson, 1987; Wood, 1999) as it demonstrated the positive relationship between the HPWS and organisational performance, represented by employee outcomes and customer satisfaction. Thus, according to the former approach, regardless of the strategy used or the context, HPWSs will always lead to excellent business results no matter what circumstances are associated with it (Paauwe and Boselie, 2005; Katou, 2009; Zhang and Morris, 2014; Katou, 2017).
obviously contradicts the latter approach, which holds that HPWSs must be consistent with strategies and context in order to maximise performance (Paauwe and Boselie, 2005; Zhang and Morris, 2014; Katou, 2017).

Second, this study provided support for the indirect relationship mechanism between the HPWS and organisational performance. The research showed the significant mediating effect of employee outcomes and service climate on the relationship between HPWS and customer satisfaction. These findings support the assumptions underlying social exchange theory, which postulates that when employees feel that their organisation is interested in investing in them by developing their skills and abilities and devising ways to motivate them, on their part, employees will appreciate this and tend to reciprocate by showing a lot of positive attitudes and behaviours. This creates a reciprocal relationship between workers and employers that should lead to higher levels of customer satisfaction (Takeuchi et al., 2007; Messersmith et al., 2011; Jiang and Messersmith, 2018).

Third, this study supports the RBV theorists who consider the HPWS as a source of sustainable competitive advantage (Lado and Wilson, 1994; Pfeffer, 1994; Becker and Gerhart, 1996; Boxall, 1996; Delery and Roumpi, 2017). The results clearly indicate that the HPWS has a direct impact on staff attitudes and behaviour and on the service climate, which ultimately has an impact on customer satisfaction. Thus, investment in an HPWS is very likely to help improve the performance of an organisation (Wright, Dunford and Snell, 2001; Shin and Konrad, 2017; White and Bryson, 2018).

Fourth, the findings of this investigation support the ‘bundles’ of practices or synergies/complementarities argument regarding HPWSs. The integration of HRM practices as one system in this study was emphasised in line with the strategic perspective or the system perspective of SHRM, as recommended by a number of researchers (e.g. Delery and Roumpi, 2017; Boon et al., 2017; Saridakis, Lai and Cooper, 2017; White and Bryson, 2018). Also, this study supported the AMO model as a framework to design the HPWS to integrate (1) practices that enhance capacity, (2) practices that promote motivation and (3) practices to enhance staff participation. Thus, when the organisation creates and uses an HPWS through a set of practices that generate and emulate the AMO model, it will contribute to enhancing staff results, ultimately contributing to improved organisational performance (White and Bryson, 2018).

Finally, the findings of this investigation support the argument of Bowen and Ostroff (2004) that the HPWS affects the service climate because it has the effect of a signalling system that
sends messages to employees about service delivery and what is expected, encouraged and rewarded by the organisation for achieving customer satisfaction. Thus, it has a positive impact on the service climate (Hong et al., 2013; Michel, Kavanagh and Tracey, 2013). Also, the findings of this investigation affirm those of earlier studies that empirically demonstrated the positive relationship between service climate and customer satisfaction (e.g. Mayer, Ehrhart and Schneider, 2009; Schneider, Macey, Lee, et al., 2009; Martínez-Tur et al., 2011; Auh et al., 2011; Lin and Liu, 2016). Moreover, this study supports the argument of Saks (2006) and Bowen and Schneider (2014) that employee outcomes play an essential role as an antecedent of the service climate. Thus, the current study expands the literature in this regard by examining the mediating role of employee outcomes in the relationship between HPWS and service climate, which will support the efforts of the academic community in its quest to build a service climate theory.

6.3.2 Practical implications

The results of this study have many important implications for public officials and policymakers in the public sector. There is robust evidence of the positive associations in this research between HPWS usage and employee outcomes, the service climate, and customer satisfaction, which justifies government officials investing in HPWSs as this should lead to the enhancement of performance levels in public sector institutions. HPWSs will promote positive attitudes and behaviour of employees that will make achieving the goals of public organisations more possible, including customer satisfaction. On the other hand, positive employee outcomes will contribute to enhancing the service climate of the organisation. Thus, the service climate will be improved, based on the findings of this study, through the HPWS and its positive impact on employee outcomes. Moreover, the results of this study suggest that HPWS usage offers mutual gains to employers and employees. Thus, a ‘win-win’ situation can be achieved in the public sector, as has been demonstrated in the private sector by previous studies (e.g. Appelbaum et al., 2000). Public-sector officials should pay attention to internal customers, who are employees, as well as to external customers, the end users. Emphasis should be placed on strengthening HRM practices that develop and advance skills and abilities, motivate staff and allow them to participate in various aspects of the work. A mutually beneficial or ‘win-win’ situation could thereby be achieved, as the organisation will have satisfied its internal and external customers, which in itself is the most essential success required by public sector institutions. Studies have shown that employee satisfaction contributes significantly to customer satisfaction (e.g. Hartline and Ferrell, 1996; Hallowell, Schlesinger and Zornitsky,
As for the service climate, HPWSs strengthen this climate directly, through practices such as training and motivation, and indirectly, through enhancing the positive behaviour of employees. According to Gabler et al. (2018), the presence of a strong service climate in the organisation is accompanied not only by a high level of customer satisfaction but also by its long-term impact on that satisfaction, which makes it more valuable to the organisation.

There is an essential point to which we would like to draw the attention of officials in the Omani public sector in particular. The results (see Section 5.2.3) show that the respondents, on average, had negative perceptions of incentives and rewards and, to some extent, training. This demonstrates the importance of improving these practices in order to raise staff performance and overall performance, especially as the respondents’ perceptions were negative regarding the intention to remain, specifically in the long term.

The empirical results of this research did not show any statistically significant differences between government ministries and public authorities in how the HPWS enhances employee outcomes and service climate to influence customer satisfaction. This casts doubt on the feasibility of establishing independent and semi-independent public organisations based on the claim by many international organisations that such organisations are more effective for the public sector and will reduce costs and increase quality and performance compared the traditional government institutions such as ministries. Public officials and policymakers in the public sector should, therefore, assign higher priority to the issue of investment in HPWSs rather than seeking structural transformations in the public-sector organisations. The process of dividing ministries or transferring some of their functions to independent public bodies established for this purpose or so-called agencification has not led to a higher level of service performance, efficiency or quality (Hammerschmid et al., 2018). Opinion polls also show a steady decline in customer satisfaction with government services in Oman, according to the National Statistics Center. The IMF also notes the need to reduce the continuing budget deficit and cut spending, especially with regard to the current public sector budget. Therefore, policymakers and public-sector officials in Oman must focus their efforts on enhancing performance in this sector by investing in HRM and managing such investments to maximise their positive effect. A number of studies indicate that the focus on agencification has proved to be a financially inefficient choice and has not led to a decline in public sector spending (Talbot, 2004; Pollitt and Talbot, 2004; Verhoest et al., 2004; Christensen and Lægreid, 2006; Verhoest
et al., 2012; Hood and Dixon, 2015; Mortensen, 2016; Verhoest, 2017; Hammerschmid et al., 2018). On the contrary, the bill for structural reforms is high and has not achieved any significant jump in performance rates since those reforms (Verhoest et al., 2012; Hood and Dixon, 2015).

6.3.3 Methodological implications

This study makes methodological implications along with its theoretical and practical implications. First, in response to calls from a number of researchers to focus on the more proximal variables when attempting to decipher the black box (Jiang, Lepak, Hu, et al., 2012; Issue and Held, 2015), this study focused on staff attitudes and behaviour (employee outcomes) as among the most relevant variables targeted by the HPWS. In order to study the impact of the different faces of this construct simultaneously, five critical variables were included, based on a review of the literature, that represent certain attitudes and behaviours of employees, namely job satisfaction, commitment, trust, motivation and intention to remain. Thus, this study responded to the literature by developing a more complex model that examines a different set of employee outcomes (Mostafa and Gould-Williams, 2014).

Second, due to the complexity of the structural model of this study, which includes both reflective and formative constructs, the PLS-SEM method of analysis was selected for use. The PLS-SEM method is distinct from other methods, such as covariance-based SEM (CB-SEM), because it allows testing such a complex model, which incorporates ‘reflective-formative’ higher-order components, in a simultaneous analysis (Lowry and Gaskin, 2014; Hair et al., 2018). This statistical methodology also enabled us to analyse simultaneously direct and indirect relationships between independent and dependent variables (Fey et al., 2009; Hair et al., 2017). Additionally, the current study is one of the first studies to use PLS-SEM to examine the moderating effect of agencification on the relationship between HPWS and customer satisfaction.

6.4 Contributions

This study set out to examine the effects of HPWSs, employee outcomes (measured via job satisfaction, commitment, trust, motivation and intention to remain), and service climate on customer satisfaction. The study contributes to our understanding of the ‘black box’ or the mechanism by which perceptions of an HPWS affects customer satisfaction. The study examined the direct effects of employee outcomes and service climate on customer satisfaction as well their mediating effects on the relationship between the HPWS and customer satisfaction.
satisfaction. Further, this study explores the moderating effect of agencification on the HPWS-customer satisfaction relationship. In general, the findings of this investigation complement those of earlier studies and represent a significant step towards enhancing our understanding by cracking open the black box and providing support for many unique relationships. Thus, the findings of this study make several contributions to the current literature.

First, this study has contributed to the literature by adopting a micro-level perspective to include the individual perceptions of the HPWS and examine the mediating role of employee outcomes and service climate on the relationship between the HPWS and customer satisfaction. The macro-level perspective widely used in SHRM studies has been criticized for ignoring staff perceptions about the HPWS (Nishii and Wright, 2008; Purcell and Hutchinson, 2007; Jiang, Takeuchi and Lepak, 2013). Several researchers believe that the employee-based approach is the most appropriate lens to explore the ‘black box’ (Gelade and Ivery, 2003; Bowen and Ostroff, 2004; Purcell and Kinnie, 2007; Cafferkey and Dundon, 2015).

Second, this study has also contributed to the literature by adopting the stakeholder approach, which focuses on non-financial indicators to assess organisational performance versus the shareholder approach, which focuses more on the use of financial indicators (Paauwe and Boselie, 2005). The shareholder approach has been widely criticised because it focuses on the short term and does not depend on a strategic view that focuses on more profound and more valuable indicators, for example, quality, stakeholder satisfaction and value added (Lee, 2008; Shahin, Naftchali and Pool, 2014; Abu Khalaf, Hmoud and Obeidat, 2019). Moreover, there is a belief among academics that there is too much emphasis on financial indicators to measure performance at the expense of other non-financial indicators and that our understanding of the relationship between the HPWS and organisational performance is therefore inadequate (Legge, 2001; Kaufman, 2010; Guest, 2011; Cafferkey and Dundon, 2015). Relevantly, the results of this research provide a more diverse view of the inclusion of different groups of close stakeholders, such as workers and clients, thereby responding to the literature highlighting the need to include such groups (Boselie, Dietz and Boon, 2005; Wright and Nishii, 2007; Jackson, Schuler and Jiang, 2014; Guest, 2017; Jiang and Messersmith, 2018). The adoption of this perspective thus provides an opportunity for further development in this area.

Third, this research contributes to the literature of SHRM as well as to the literature of NPM. There are numerous calls to investigate the HPWS-organisational performance link in the autonomous and semi-autonomous organisations resulting from the agencification process.
since the vast majority of researchers have not considered these types of organisations and there
is lack of empirical studies in this area (Verhoest et al., 2012; Bezes and Jeannot, 2018; Blom
et al., 2018; Farooq et al., 2018; Hammerschmid et al., 2018). Moreover, according to Dietz,
Pugh and Wiley (2004) and Mayer, Ehrhart and Schneider (2009), there are still opportunities
to help develop service climate theory by examining additional moderators in the relationship
that links service climate with customer satisfaction. Thus, the current study expands the
literature in this area by examining the moderating role of agencification on two main
categories of public sector entities: government ministries and public authorities. However, the
results of these investigations did not support NPM’s claim that agencification is an effective
way to render public bureaucratic institutions more effective in achieving customer
satisfaction.

Fourth, this study contributes to literature because it was conducted in the context of the public
sector. The private sector is dominant in the contexts of previous studies in this area (Knies et
al., 2018). Rees (2013) attributed the decline in the performance of the public sector in many
developing countries to weak HRM systems, there is a paucity of studies in developing
countries on the relationship between these systems and organisational performance (Knies and
Leisink, 2017). Moreover, most studies conducted in the public sector have been conducted in
the West (Knies and Leisink, 2017). Thus, this study contributes to literature because it was
conducted in the context of the Omani public sector.

Finally, one of the main contributions of this study is that it serves as a baseline evaluation of
the role of HPWSs in the public sector before the implementation of the unified law of HRM
in public sector institutions in Oman, including the sample of this study of ministries and public
authorities. This study will therefore provide a scientific basis to compare the extent to which
the impact of HPWSs will change due to the application of that law in the near future.

6.6 Limitations of the Study

A number of limitations need to be noted regarding the present study. First, although the study
has successfully demonstrated that the HPWS is positively associated with staff attitudes and
behaviours and with the service climate within the relationship between the HPWS and
customer satisfaction, it has certain limitations in terms of causation. The present study adopted
a cross-sectoral survey strategy because it is more representative of the general population
(Malhotra and Birks, 2007), takes less time (Saunders, Lewis and Thornhill, 2016) and is
commonly used in business research (Sekaran and Bougie, 2016; Jiang and Messersmith,
However, this strategy is nevertheless unable to identify or substantiate the causal relationships between the variables studied (Saridakis, Lai and Cooper, 2017).

Second, the generalisability of the results of the current study is subject to certain limitations. The present study used the nonprobability sampling design using a judgment sampling or what is often called *purposive sampling* (Churchill and Iacobucci, 2005). Judgment sampling is usually used when a limited number of people have the required information (Sekaran and Bougie, 2016). Accordingly, judgment sampling was used in this study because it helped the researcher to reach staff who have a direct connection with the end users within the target population. Consequently, the results of this study are not generalisable to the entire Omani public sector and are limited to the study sample.

Third, there is no consensus on the HRM practices that should be comprised by an HPWS, which usually differ among studies (Posthuma *et al.*, 2013; Delery and Roumpi, 2017). HPWSs typically include ‘bundles’ of practices such as staffing, training, performance appraisal, compensation, job design, and involvement and participation (e.g. Datta, Guthrie and Wright, 2005; Zacharatos, Barling and Iverson, 2005; Kalleberg *et al.*, 2006; Boxall and Macky, 2007; Sun, Aryee and Law, 2007; Takeuchi *et al.*, 2007; Wang and Xu, 2017; White and Bryson, 2018). Thus, the eight practices selected for this study may not represent all the HPWS practices used by institutions. However, the AMO model appears to be the common link between the various proposed groups of practices in the SHRM literature (Boselie, Dietz and Boon, 2005; Kepes and Delery, 2007; Kehoe and Wright, 2013; Delery and Roumpi, 2017; Saridakis, Lai and Cooper, 2017; White and Bryson, 2018; Jiang and Messersmith, 2018). Thus, in the present study, the researcher adopted the AMO model as a theoretical framework for selecting HPWS practices. This model reflects practices that enhance staff abilities, motivation and opportunities to contribute to organisational performance (Delery and Roumpi, 2017; Jiang and Messersmith, 2018).

**6.7 Directions for Future Research**

In terms of future work, it would be interesting to repeat the study described here using a longitudinal research design because it would provide more information about the nature of the relationship between the HPWS and customer satisfaction and assessing causality (Saridakis, Lai and Cooper, 2017). Further, this design would also enable understanding of the ongoing impact of HPWSs and whether it will continue or have short-term effects (Jiang and Messersmith, 2018). However, longitudinal studies are accompanied by challenges and
difficulties related to financial costs and the long period required to implement them as well as the low rate of follow-up response since such studies take place between periods that are distant in time (Saridakis, Lai and Cooper, 2017).

Future studies should address the question raised by this research regarding the positive impact of agencification on the performance of the public sector (Sakdiyakorn and Voravivatana, 2015). Overman and van Thiel (2016) argue that when agencification creates more single-purpose and professional agencies, those agencies can provide more focus on the needs of customers. However, the results of this research did not support NPM’s claim that agencification is an effective way to render public bureaucratic institutions more effective in achieving customer satisfaction. Future studies may, therefore, wish to consider examining the extent of intended versus actual autonomy of HRM and its role in autonomous bodies (Farooq et al., 2018; Kleizen, Verhoest and Wynen, 2018). It would also be interesting for future research to compare the role of HPWSs in the public sector after the implementation of the unified law of HRM in public-sector organisations in Oman with the findings of this study, which could serve as a baseline for comparison.

Future research can extend the examination of intermediary variables such as employee outcomes and the service climate to more than one level within the organisation, so that the relationship between these variables can be determined at the individual and organisational levels, for example. It will also be interesting to examine the role of employee performance in the relationship between employee outcomes and customer satisfaction. Finally, future studies could consider the mediating effects of societal culture fit on the relationships between the HPWS and organisational performance. Some researchers have suggested that societal culture can influence this relationship (e.g. Branie and Pollard, 2010 and Al-Jahwari and Budhwar, 2016).
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Appendix A: Letter of Approval for Research Ethics

18 February 2018

LETTER OF APPROVAL

Applicant: Mr. Ayd Fadhil
Project Title: S-HRM
Reference: 2326-LR-Feb/2016-1855

Dear Mr. Ayd Fadhil

The Research Ethics Committee has considered the above application recently submitted by you. The Chair, acting under delegated authority, has agreed that there is no objection on ethical grounds to the proposed study. Approval is given on the understanding that the conditions of approval set out below are followed:

- The agreed protocol must be followed. Any changes to the protocol will require prior approval from the Committee by way of an application for an amendment.

Please note that:

- Research Participant Information Sheets and (where relevant) flyers, posters, and consent forms should include a clear statement that research ethics approval has been obtained from the relevant Research Ethics Committee.
- The Research Participant Information Sheets should include a clear statement that queries should be directed, in the first instance, to the Supervisor (where relevant), or the researcher. Complaints, on the other hand, should be directed, in the first instance, to the Chair of the relevant Research Ethics Committee.
- Approval to proceed with the study is granted subject to receipt by the Committee of satisfactory responses to any conditions that may appear above. In addition to any subsequent changes to the protocol.
- The Research Ethics Committee reserves the right to sample and review documentation, including raw data, relevant to the study.
- You may not undertake any research activity if you are not a registered student of Brunel University or if you cease to become registered, including absence or temporary withdrawal. A censored student would not be insured to undertake research activity. Research activity includes the recruitment of participants, undertaking consent procedures and collection of data. Breach of this requirement constitutes research misconduct and is a disciplinary offence.

[Signature]

Professor Jassim Kamal
Chair
College of Business, Arts and Social Sciences Research Ethics Committee
Brunel University London
Appendix B: Cover Letter and Questionnaire

Cover letter for the survey

You are asked to assist in a study that seeks to provide a better understanding of the relationship between strategic human resource management practices and organisational performance in the public sector in Oman. Please take a few minutes to fill out this questionnaire based on your current career experience. Completing this questionnaire is entirely voluntary. However, your time and cooperation concerning this survey will be much appreciated and will provide valuable information for research in human resources management. The results of this study can help improve organisational performance in the public sector in Oman. Individual responses to this survey will remain confidential and will not be disclosed. Also, there are no right or wrong answers and your employment status will not be affected. No reference will be made in written or oral materials that could link you to this study. Only grouped data will be reported in the results.

The data contained in this questionnaire will remain confidential and will only be used within the framework of the academic study. This study was approved by the Research Ethics Committee at Brunel University in the United Kingdom to ensure that the highest standards and requirements of scientific research are met.

If you would like additional information, please do not hesitate to email me at adel.fadhil@brunel.ac.uk. Also, if you have any concern regarding this study, you could email the supervisor of this study Dr Satwinder Singh at satwinder.singh@brunel.ac.uk. In case of complaints, you should directly contact the Chair of the Research Ethics Committee at Brunel University.

If you would like to complete this survey online, please scan the following QR code.

Thank you very much for your help,

Adel Fadhil
Brunel University London
United Kingdom
Q1: To what extent do you agree or disagree with each of the following statements about your institution? (Please circle one number for each)

<table>
<thead>
<tr>
<th>Statement</th>
<th>Strongly disagree</th>
<th>Disagree</th>
<th>Slightly disagree</th>
<th>Neither agree nor disagree</th>
<th>Slightly agree</th>
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</table>
1.27 I believe job rotation is an excellent system.  
1.28 Overall, I like job rotation.  
1.29 The duties of this job are clearly defined.  
1.30 This job has an up-to-date job description.  
1.31 The job description for this job contains all of the duties performed by individual employees.  
1.32 I have a job description that accurately describes the work I do.  

Q2: To what extent do you agree or disagree with each of the following statements? (Please circle one number for each)  

<table>
<thead>
<tr>
<th>Q2</th>
<th>Agreed Statements</th>
<th>Strongly disagree</th>
<th>Disagree</th>
<th>Slightly disagree</th>
<th>Neither agree nor disagree</th>
<th>Slightly agree</th>
<th>Agree</th>
<th>Strongly agree</th>
</tr>
</thead>
<tbody>
<tr>
<td>2.1</td>
<td>In general, I am satisfied with my job.</td>
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<td>2.2</td>
<td>My current job fulfils the expectations I had before I started it.</td>
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<td>2.3</td>
<td>My current job is pleasant.</td>
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<td>2.4</td>
<td>I think my current job is interesting and fascinating.</td>
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<td>2.5</td>
<td>I am willing to work harder than I have to in order to help my institution succeed.</td>
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<tr>
<td>2.6</td>
<td>I am proud to work for this institution.</td>
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<td>2.7</td>
<td>I feel a strong sense of belonging to my institution.</td>
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<td>2.8</td>
<td>I would refer a friend to come work at this institution.</td>
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<td>2.9</td>
<td>I am treated fairly by my institution.</td>
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<td>2.10</td>
<td>In general, I trust my institution to keep its promises or commitments to me and other employees.</td>
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<tr>
<td>2.11</td>
<td>My institution has always kept its promises about the demands of my job and the amount of work required of me.</td>
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<tr>
<td>2.12</td>
<td>I am always behaving in ways that help my institution’s performance.</td>
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<tr>
<td>2.13</td>
<td>I am always contributing in positive ways to the institution’s performance.</td>
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<tr>
<td>2.14</td>
<td>I am highly motivated compared to other employees in other institutions.</td>
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<tr>
<td>2.15</td>
<td>I am highly motivated.</td>
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<tr>
<td>2.16</td>
<td>I would turn down a job with more pay in order to stay with my institution.</td>
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<tr>
<td>2.17</td>
<td>I plan to spend my career at this institution.</td>
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<td>2.18</td>
<td>I intend to stay at this institution for at least the next 12 months.</td>
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<td>2.19</td>
<td>I do not plan to look for a job outside of this institution in the next six months.</td>
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</tbody>
</table>
Q3: To what extent do you agree or disagree with each of the following statements? (Please circle one number for each)

<table>
<thead>
<tr>
<th></th>
<th>Strongly disagree</th>
<th>Disagree</th>
<th>Slightly disagree</th>
<th>Neither agree nor disagree</th>
<th>Slightly agree</th>
<th>Agree</th>
<th>Strongly agree</th>
</tr>
</thead>
<tbody>
<tr>
<td>3.1</td>
<td>I have knowledge of the job and the skills to deliver superior quality work and service.</td>
<td>1</td>
<td>2</td>
<td>3</td>
<td>4</td>
<td>5</td>
<td>6</td>
</tr>
<tr>
<td>3.2</td>
<td>I receive recognition and rewards for the delivery of superior work and service.</td>
<td>1</td>
<td>2</td>
<td>3</td>
<td>4</td>
<td>5</td>
<td>6</td>
</tr>
<tr>
<td>3.3</td>
<td>The overall quality of service provided by me to customers is excellent.</td>
<td>1</td>
<td>2</td>
<td>3</td>
<td>4</td>
<td>5</td>
<td>6</td>
</tr>
<tr>
<td>3.4</td>
<td>I am provided with the necessary resources to support the delivery of quality work and service.</td>
<td>1</td>
<td>2</td>
<td>3</td>
<td>4</td>
<td>5</td>
<td>6</td>
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</table>

Q4: To what extent do you agree or disagree with each of the following statements? (Please circle one number for each)

<table>
<thead>
<tr>
<th></th>
<th>Strongly disagree</th>
<th>Disagree</th>
<th>Slightly disagree</th>
<th>Neither agree nor disagree</th>
<th>Slightly agree</th>
<th>Agree</th>
<th>Strongly agree</th>
</tr>
</thead>
<tbody>
<tr>
<td>4.1</td>
<td>I think that our customers are satisfied with our services generally.</td>
<td>1</td>
<td>2</td>
<td>3</td>
<td>4</td>
<td>5</td>
<td>6</td>
</tr>
<tr>
<td>4.2</td>
<td>I think that our customers are provided with high-quality service.</td>
<td>1</td>
<td>2</td>
<td>3</td>
<td>4</td>
<td>5</td>
<td>6</td>
</tr>
<tr>
<td>4.3</td>
<td>I think that our customers feel pleased with our institution.</td>
<td>1</td>
<td>2</td>
<td>3</td>
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**General Background information**

The following information is needed to help analyses the results. Please respond by ticking the appropriate boxes or completing the blank spaces.

a. Your Gender is: Male □ Female □

b. Your age is: 20-30 years □ 31-40 years □ 41-50 years □ 51-60 years □ Over 60 years □

c. Your highest level of education achieved:
   - Diploma □ Undergraduate □ Masters □ PhD □ Other (please specify) ………………………

d. Your current institution is: Ministry □ Public Authority □

e. Please specify the name of the institution: ………………………………………………………………………

f. Your current job is: Middle / Line Manager □ Section Head □ Employee □

g. Length of service in your current institution:
   - Under 5 years □ 5-10 years □ 11-15 years □ Over 15 years □

THANK YOU FOR YOUR KIND COOPERATION