



BIRMINGHAM CITY
University

**THE ROLE OF HUMAN RESOURCE MANAGEMENT IN
ACHIEVING ORGANISATIONAL AGILITY**

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DEDICATION

This thesis is dedicated to my father, *Mahmood Azizsafaei*, whose encouragement made me interested in learning in the first place and my mother, *Fatemeh Anbardaran*, whose love and support made me the person I am. I thank you for dealing with me being thousands of miles away and only sending your best wishes for my happiness and success.

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ABSTRACT

Whilst uncertainty and change has always been the focal point of strategic management theories, the increasing rate of change and uncertainty that organisations have been experiencing during the past few decades has stimulated new approaches to the strategic management of firms.

‘Agility’ has been introduced as an appropriate paradigmatic approach to integrative strategy making ((Doz and Kosonen, 2008, 2010; McGrath, 2013a, 2013b; Sharifi, 2014). The concept has been considered as providing a comprehensive and cohesive platform for addressing the new conditions in the business environment, epitomised in notions such as hyper-competition, hyper-turbulence, and the continuously morphing business environment, through the perpetual process of altering and adjusting the firm’s direction and courses of action (Doz and Kosonen, 2008). The main aim behind the concept is to maintain strategic supremacy and competitiveness by anticipating and taking advantage of change ((D’Aveni, 1994; Thomas, 1996; Doz and Kosonen, 2007; Jamrog et al., 2006), and coping with and surviving unexpected changes (Zhang and Sharifi, 2000).

Agile organisations rely on a series of agility capabilities such as strategic sensitivity, decision making prowess, learning aptitude and resource fluidity and flexibility (Hamel and Prahalad, 1993; Dyer and Shafer, 2003; Doz and Kosonen, 2008; Lengnick-Hall and Beck, 2009), many of which are human-related. A review of the agility literature revealed that achieving agility, similar to other value-based management philosophies, is heavily dependent upon various human factors such as Human Resources (HR) strategy, management approach and the prevailing culture of an organisation (Harper and Utley, 2001; Street et al., 2003; Dyer and Ericksen, 2006). However, the review of Strategic Human Resource Management (SHRM) literature indicated that the SHRM studies have not responded to the agility agenda, thus, little is known about human resource management strategies and systems enabling organisational agility.

In an effort to fill this gap, this research has focused on exploring the people aspects of organisational agility aiming at:

1. Identifying the HRM critical roles in developing organisational agility
2. Developing a theoretical model for crafting and implementing a HR Strategy which

assists organisations in acquiring agile attributes. The conceptual model delineates the key constructs and features of an Agility-Oriented Human Resource Strategy (AOHRS).

The research was conducted through exploratory qualitative research, collecting data mainly through semi-structured interviews with HR directors, agility professionals and senior managers from 17 large public and private organisations in the UK.

The research explicated the need and developed a conceptual framework for AOHRS, which gives explicit attention to an array of external environment forces. The framework proposes the need for ongoing reinterpretation of contextual information, frequent review of necessary individual and organisation-wide skills portfolio and capabilities profiles, and frequent re-evaluation of HR principles, policies and practices-in-use to reflect the persistent uncertainty and continuously morphing business conditions. The framework also offers for a dynamic HR system which can analyse capability needs continuously and have appropriate policies and practices in place to easily and quickly reconfigure the firms' human assets.

The study contributes to the knowledge in the field of SHRM and organisational agility by presenting a comprehensive conceptual framework for AOHR strategy, complemented by an expansive definition for an Agility-Oriented SHRM suitable for an uncertain business environment. As part of this, the attributes and capabilities of the agile workforce, a series of Agility-Oriented HR Principles and a series of widely-adopted Agility-Oriented HR Practices are also empirically identified in addition to the characteristics and dimensions of an Agile HR Function.

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ABBREVIATIONS

AOHRS	Agility-Oriented Human Resource Strategy
AOSHRM	Agility-Oriented Strategic Human Resource Management
AO	Agility-Oriented
HR	Human Resources
HRM	Human Resource Management
SHRM	Strategic Human Resource Management
AOHR	Agility-Oriented Human Resource
DO	Dynamic Organisation
UK	United Kingdom
AM	Agile Manufacturing
L&D	Learning and Development
TA	Template Analysis
CIM	Computer-Integrated Manufacturing
R&D	Research and Development
IPA	Interpretative Phenomenological Analysis
RQ	Research Question
CIPD	Chartered Institute of Personnel and Development

CHAPTER ONE
INTRODUCTION AND OVERVIEW OF THE STUDY

1.1 Introduction

This chapter provides a general overview of the research, by introducing the background of the study, discussing the problems and gaps to be addressed and justifying the rationale and the significance of the research. It presents the aims and objectives of the study, and the research questions that were set to be answered. It also outlines the process and methodology employed to undertake the research. The final section of the chapter outlines the structure of the thesis followed by a summary of this chapter.

1.2. The Research Background

1.2.1 The Emergence of the Turbulent Business Environment and Agility as A Theory in Response

Change is an unavoidable aspect of organisational life. It can be imposed by formidable external forces, or caused as the natural effect of the interaction and interdependence of internal factors, and in some circumstances, is an intentional and proactive strategic action planned by organisations to punctuate their market by creating disruptive shifts in order to maintain their strategic superiority (D'Aveni, 1999).

Whilst uncertainty and change has always been the focal point of strategic management theories, the increasing rate of change, complexity and uncertainty that organisations have been experiencing during the past few decades have motivated theorists to provide a more accurate portrait of environmental change and the way organisations manage uncertainties and complexity to maintain competitiveness (D'Aveni et al., 2010; McGrath, 2013b).

New conditions in the business environment have been epitomised in concepts such as hyper-competition, hyper-turbulence, and a continuously morphing business environment, which in turn has stimulated new approaches to the strategic management of firms, as the conventional strategies such as adaptive fit (Chakravarthy, 1982) are criticised for their inability to sufficiently accommodate the full spectrum of the above environmental conditions (Lengnick-Hall and Beck, 2005).

Subsequently, alternative strategic approaches appropriate for these emerging business

environments, have been introduced. These include dynamic capability¹ (Teece et al., 1997; Eisenhardt and Martin, 2000), resilience capacity² (Hamel and Valikangas, 2003; Lengnick-Hall and Beck, 2005; McCann, 2004), robust transformation³ (Lengnick-Hall and Beck, 2005), and strategic agility ((McCann, 2004; Doz and Kosonen, 2007; Lengnick-Hall et al., 2009; McGrath, 2013).

This study focuses on the concept of *organisational agility*, which has emerged in the literature as the appropriate *strategy* ((Doz and Kosonen 2008, 2010; McGrath, 2013; Sharifi, 2014) and necessary *capability* (e.g.: Goldman et al., 1995; Vokurka and Fliedner, 1998; Gunasekaran, 1999; Zhang and Sharifi, 2000; Braunscheidel and Suresh, 2009) for competing and surviving in today's increasingly competitive, dynamic and uncertain business environment. The concept has been asserted as providing a comprehensive and cohesive platform for addressing the new conditions in the business environment, through the perpetual process of altering and adjusting the firm's direction and courses of action (Doz and Kosonen, 2008), by the aid of dynamic capabilities which are created within the firm and its network of accessible resources (Sharifi, 2014).

The main aim behind the concept is to maintain strategic supremacy and competitiveness by anticipating and taking advantage of change ((D'Aveni, 1999; Thomas, 1996; Doz and Kosonen, 2007; Jamrog et al., 2006), and coping with and surviving unexpected changes (Sharifi and Zhang, 2001) through continuous renewal of the firm, its business models and organisational and functional strategies (Sharifi, 2014).

1.2.2 The Importance of HR Agility and The Research Problems

Agility, the continual and rapid reconfiguration of business strategy and organisational arrangements, requires a rich and varied source of organisational capabilities such as

¹ Dynamic Capability: an organisation's "ability to integrate, build and reconfigure internal and external competencies to address rapidly changing environments" (Teece et al., 1997:516).

² Resilience Capacity: an antecedent to strategic agility which enables a firm to "effectively absorb, respond to and potentially capitalise on disruptive surprises". This organisational capacity is resulted from interactions between three particular cognitive, behavioural, and contextual properties which are crucial in understanding the situation and developing customised responses. (Lengnick-Hall and Beck, 2009:4)

³ Robust Transformation: "a deliberately transient, episodic response to a transient and fluid environmental condition, enabling a firm to accommodate the level of complexity in its environment by creating new options and capabilities, without assuming that specific environmental conditions will move to a new equilibrium" (Lengnick-Hall and Beck, 2005: 742)

strategic sensitivity, decision making prowess, learning aptitude and resource fluidity and flexibility (Hamel and Prahalad, 1993; Dyer and Shafer, 2003; Doz and Kosonen, 2008; Lengnick-Hall and Beck, 2009), which are mainly human-related. Human Resource Management (HRM) in this view can be a source of strategic advantages for firms, by producing a rich pool of human resources and competencies that make the reconfiguration and transformation of business strategy, business models and activity systems easier and quicker.

Correspondingly, a review of agility literature reveals that achieving organisational agility similar to other value-based management philosophies is profoundly dependent upon various human factors such as HR strategy, management approach and the prevailing culture of an organisation (Harper and Utley, 2001; Street et al., 2003; Dyer and Ericksen, 2006).

For instance, Goldman et al. (1995) distinguished ‘people’ as one of the four main dimensions of agility. They highlighted the role of leveraging knowledge and the competencies of employees, and indicated motivation and empowerment as investments to the future success of business. Likewise, Vernadat (1999) identified human aspects as one of the three dimensions of agile manufacturing (AM)- i.e. organisation, technology and human- and emphasised the role of ‘human factors’ as a key success factor in achieving agile manufacturing, whilst also suggesting that organisations need to master competency management and employee satisfaction. Similarly, Vázquez-Bustelo et al. (2007:1323) identified ‘Agile Human Resource’ as an agility enabler that can promote effective integration of the basic elements of the firm, by developing “highly trained, motivated and empowered employees working in teams”.

However, despite extensive emphasis on the critical role of people and agile HR in achieving agility (Kidd, 1995; Goldman et al., 1995; Plonka, 1997; Forsythe, 1997; Breu et al., 2002; Crocitto and Youssef, 2003; Vázquez-Bustelo et al., 2007; Sherehiy, 2008; Farsijani, 2015), agility studies have not paid enough attention or only superficially dealt with the HR aspects of the organisations. In the same vein, Crocitto and Youssef (2003) discovered a tendency among agility researchers to focus more on the ‘hard’ aspects of organisational agility such as supplier-customer chains, reduction of lead time, rapid inventory accessibility, and mathematical models and information technology (IT). In

contrast, the 'soft' side (human side) including contextual factors such as culture, communication, leadership, and motivation have been given less attention.

Against this literature gap, a research study by the Economist Intelligence Unit (2009) stressed that almost 90% of executives regard agility as crucial for success in rapidly changing competitive environments. Despite this growing interest for becoming more agile, its success rate has been reported to be limited (Glenn, 2009:3). Embracing agility by SHRM is becoming particularly important as the majority of the factors reported to contribute to the success or failure of agility strategies are very much 'human-related'- including slow decision-making, conflicting departmental goals and priorities, risk-averse cultures and silo-based information (Glenn, 2009; CIPD, 2013).

This, in addition to the increasing rate of change and uncertainties in the business and notably HR environment⁴, suggests the urgent need for infusing agility into HRM. A brief review of the context, in which HR operates, shows the growing uncertainty and complexity of the HR environment. Technological changes have particularly been significant in this context, influencing the way, where and when employees live and work (Noe, 2010). The new way of working has become 24/7, borderless and constantly in flux (Corsello, 2013). Performing in the knowledge economy with the increasing value placed on human capital (Lengnick-Hall and Lengnick-Hall, 2002; Noe, 2010; Morris and Snell, 2010), the emergence of virtual organisations and intense competition for talent have been other pressures on HR that need to be addressed.

The accelerated changing needs of the workforce in particular, who expect a higher degree of responsibility and autonomy, career development, mobility and employability opportunities, faster promotions, and more flexible working times and places invite attention to the need for a new outlook on HRM (Lengnick-Hall and Lengnick-Hall, 2002; Noe, 2010; Bersin, 2012; Capretta, 2012; Morris and Snell, 2010; Corsello, 2013).

All of these issues give significance to the agility of HRM, and provide the rationale for why an Agility-Oriented HR Strategy (AOHRS) is needed. While the above challenges do not change the definition of HR strategy, they certainly impact on the key objectives of it

⁴ HR environment: The context in which HR function operates.

and the way HR should change its principles and practices to adapt to the complexities and changes in the environment.

From this perspective, a review of SHRM literature is conducted to examine how the field studies have responded to the new conditions in the business and HR environment- i.e. increased uncertainties, dynamics and complexities, and how SHRM theories have evolved in the light of emerging strategic management theories and approaches. The review indicates that the SHRM research has not been updated in line with the advances in other areas (Jackson et al., 2014), paying little attention to the concept of dynamic shifts, hyper-competition, and environmental jolts. In particular, the field has not responded to the agility agenda, due to being very slow in linking strategic agility and HR strategies (Shafer et al 2001; Dyer and Shafer, 1999, 2003; Dyer and Ericksen, 2006).

Hence, little is known about the implication of agility strategies for the workforce, and human resource management strategies and systems as enabling factors of organisational agility. By far, the most important void in the SHRM and agility literature is a comprehensive theoretical model for AOHR strategy. Among a long list of unexplored issues about the subject of HR- agility, the most important issues are:

How agility could be defined or conceptualised at the individual level; how the concept can be infused in SHRM theories and practices; how HR function can contribute in developing agility; how HR can create an organisational culture favouring agility; how HR can create workforce agility capabilities; what HR principles and practices are most effective in developing workforce agility; and finally how agility can be approached and adopted by HR function itself, so that, the way HR functions and its structure can be reengineered in a way that can meet the requirements of agility strategies.

The final issue is specifically important as none of the previous work has explored this matter, while HR has a history of being criticised for playing an anti-agility role, due to its operational and bureaucratic focus, and inability to keep up with change (Lengnick-Hall and Lengnick-Hall, 2002:139). As an illustration, Ulrich (2009) suggests HRM often does not have the necessary agility to effectively manage people and accomplish overall business strategy, yet alone to go beyond strategy and link the HR strategy with environmental factors and the stakeholders' requirements. Correspondingly, HR is listed among the least agile departments in the Economist report (Glenn, 2009).

The literature, with a small number of studies focusing on HR-agility, was found to be limited and insufficient in resolving the issues mentioned above, with considerable shortcomings which will be discussed with further details in Chapter two. However, the expanding interest of organisations in enhancing their agility worldwide, and particularly the growing concerns for increasing workforce agility in the UK⁵, in addition to the philosophical argument behind the need for embracing agility by SHRM, made the concept a valuable and significant research subject.

1.3 Aims, Objectives and Research Questions

The previous section delineated the importance of updating HRM theories and research, both at strategy and practice levels, to embrace the concept of agility as an advanced strategic approach for addressing new conditions in the business environment. It highlighted that HRM, as a strategic resource and function of organisations, should revisit its approach, strategies, processes, policies and practices as well as its resources and infrastructures to become agile enough to keep a pace with the shifts in strategic directions, and to respond to challenges in the business and HR environment, in order to assist the organisations to proactively take advantage of future opportunities.

Against this background and given the scant attention to human resources in agility literature, and also the limitations of HRM literature in providing insights for dealing with a dynamic and uncertain business environment (Boxall, 2011), this research has attempted to address the identified gaps by focusing on exploring the people aspects of organisational agility.

Research Aims: This research has focused on exploring the people aspects of organisational agility aiming at:

1. Identifying the HRM critical roles in developing organisational agility

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- ⁵ Workforce agility becomes the area of focus for the UK government. Sir Winfried Bischoff, Chairman of Lloyds Banking Group, indicates that Nick Clegg, the Deputy Prime Minister, requested him to establish “a group of Chief Executives and Chairmen from leading employers to consider the issue of workforce agility and how UK business might support the growth of workforce agility across UK plc.” They launched the Agile Future Forum (AFF) in 2013 and believe that workforce agility can offer a competitive advantage for companies and for the UK economy. (See here <http://www.agilefutureforum.co.uk/purpose-objectives/>)

2. Developing a theoretical model, supported by an evidence-based practical approach and guides, for crafting and implementing a HR Strategy which assists organisations in acquiring agile attributes.

Following are the objectives of the study:

Objective 1: To develop an understanding of the human aspects of organisational agility, and identify the human factors that are critical to the achievement of agility

Objective 2: To explore how HR function can contribute in achieving organisational agility, delineate the key HR roles, and identify the main constructs and features which constitute an HRM supportive for agility and the relationship between these factors.

Objective 3: To contribute to the knowledge of organisational agility and the SHRM field by deriving a conceptual framework for agility-oriented Human Resource Strategy (AOHRS), which helps organisations in acquiring agile characteristics.

The following research questions (RQ) derived from the literature will direct the empirical part of the study:

Research questions related to Objective 1:

RQ1: What is the role of organisational culture in achieving agility? What are the key characteristics of organisational culture that are both critical and supportive in creating organisational agility?

RQ2: What are the characteristics and attributes of people which are central to achieving agility?

Research questions related to Objective 2:

RQ3: What are the roles of HRM in achieving organisational agility?

RQ4: What are the characteristics of an agile HR function?

RQ 5: What HR practices are being used by organisations and are perceived as effective in achieving organisational and workforce agility?

1.4 The Research Process

To accomplish the aims and objectives of the research, an interdisciplinary approach was adopted. So, the existing literatures in the areas of strategic and organisational agility, agile manufacturing and supply chain agility, strategic management, SHRM, and organisational dynamic and change were reviewed to see how the existing theories and perspectives provide insights for HRM in organisations performing in an uncertain and turbulent business environment, and to discover how people's management principles and practices should be adopted in such circumstances.

Moreover, an inductive approach was adopted in which qualitative methods were used as the appropriate fit for undertaking the research. The research was conducted through an exploratory qualitative research, collecting data mainly through semi-structured interviews with HR directors and managers, agility professionals and senior managers from 17 large public and private organisations in the UK. Semi-structured interview was used as the main data collection technique, while information from the companies' annual reports and the internal documents provided by some of the organisations were also used as sources of data.

The research has followed the 'progressive focusing' model (Stake, 1981; 1995), so that data collection, data analysis and the development of theories were considered as iterative and interrelated processes. This allowed a constant interaction between theory and data during the course of data collection and analysis processes. In addition, template analysis (TA) technique was selected and applied for the qualitative data analysis (King, 2012) along with the application of qualitative data analysis software package, QSR-NVivo 10. The research is carried out following a process consisting of the following main phases:

- Literature review
- Preliminary pilot focus group
- Expert panel
- Developing a preliminary conceptual framework
- Field work studies and data analysis
- Synthesising the findings with extant literature and developing an updated conceptual framework for Agility-Oriented SHRM

1.4.1 Scope of the Research

As will be explained in Chapter two, several typologies exist regarding the scope of agility. For instance, organisational agility, manufacturing agility, workforce agility, agile software development, workplace agility, agile working, cultural agility, leadership agility, and agile learning. Given the existence of the various types and scopes of agility, it is important to clarify the type and scope of agility which is the focus of this study.

This research approaches agility from an organisational perspective, consider it as the appropriate *strategy* ((Doz and Kosonen, 2008, 2010; McGrath, 2013; Sharifi, 2014) and necessary *capability* (e.g. Goldman et al., 1995; Vokurka and Fliedner, 1998; Gunasekaran, 1999; Zhang and Sharifi, 2000; Braunscheidel and Suresh, 2009) for competing and surviving in today's increasingly competitive, dynamic and uncertain business environment. The research adopts the definition provided by Sharifi (2014) as the conceptual basis on which the theoretical arguments of the research and the resulting conceptual framework for the agility-oriented strategic HRM will be set up.

“the strategic approach to the continual process of choosing, changing and adjusting the firm's direction in response to circumstances in the business environment, by relying on dynamic capabilities developed within the firm and its network of accessible resources... The central aim here is to maintain strategic competitiveness through continuous renewal of the firm, its business models and organisational and functional strategies” (Sharifi, 2014:19)

So, agility in this research is considered as an umbrella term for a strategic approach, encompassing all initiatives aimed at improving organisations' responsiveness to unpredictable changes in their external environments. Although, there are many factors that impact the agility of an organisation, the focus of this study is on human aspects of agility and the other elements are not included within the scope of this research. Therefore, the operational aspects of agility, agile technologies and workplace designs are studied briefly and only in relation to their impacts on workforce agility.

1.5 Structure of the Thesis

This thesis consists of eight chapters. The structure of the thesis is shown in Figure 1.1. This chapter has outlined the background, rationale, aim and objectives and an overview of the study. It provides an overview of the research problem and context, and its importance.

Chapter Two critically reviews the relevant literature related to organisational agility, workforce agility and AOHRM, concerning the research aims, objectives and questions. It incorporates theoretical foundations and the preliminary conceptual framework for conducting the research. Key subjects covered in chapter two include organisational agility, strategic agility, agility capabilities, workforce agility capabilities, AOHR strategies, principals and practices. Within this context the chapter discuss various definitions and conceptualisations of the concepts, their history and origins, and key factors.

The chapter provide a critical review of the relevant literature in order to develop an understanding of how the existing theories and perspectives provide insights for HRM in organisations performing in uncertain and turbulent business environment, and to discover how people management principles and practices should be adopted in such circumstances. Another aim of reviewing the literature is to identify the key human factors that are critical to the achievement of agility, and the main constructs and features constituting the HRM supportive for agility and relationship between these factors.

Chapter Three explains the epistemological and ontological perspective and stand of the research. Based on the explained epistemological and ontological position, the selected design and methodology of the study are critically discussed and justified. The chapter also describes the research method undertaken to collect data from the UK organisations and the criteria for selecting participating organisations. Finally, the data analysis procedures and the development journey that have been undertaken to achieve research objectives will be described in Chapter three.

Chapters Four and Five present the data from the interviews and qualitative analysis. A qualitative data analysis software package QSR-NVivo is used to facilitate the key processes of theory development including the analysis of data, the development of theory and the presentation of findings.

Chapter Six presents and discusses the findings in relation to each research question and in light of existing research and theories.

Chapter Seven outlines the updated conceptual framework for AOHR strategy based on the findings from the empirical study and the insights obtained from the conducted review

of the literature.

Finally, Chapter Eight provides summaries and discussions of the findings in light of the research aims and objectives and outlines the conclusion. The developed theory will be considered in the context of its contribution to knowledge and its implications for existing theories and practices. Also included in Chapter Eight are the limitations of the study, and the areas identified for further research. Recommendations are proposed about the way HR strategy should be transformed to an agile strategy.

1.6 Summary of the Chapter

In summary, this thesis is an exploration of the human aspects of organisational agility, identifying the critical roles of HR in building and sustaining agility capabilities, and the main constructs and features constituting the HRM supportive for agility and the relationship between these factors. It will provide original information, relating to the above concepts, collected from HR directors, agility and organisational development professionals and senior executives from large public and private organisations in the UK.

This chapter has introduced the background of the research by discussing and justifying the significance of the research for both theory and practice, the problems, gaps and questions to be addressed, and presents the research aims, objectives, process and selected methodology. It has discussed the insufficiency and limitations of the extant literature and highlighted the need for new theories and insights describing the role of HRM in achieving and sustaining agility capabilities. It has also stressed the importance of crafting an AOHR strategy and identifying AOHR principles and practices in response to the requirements of new business conditions.

The thesis structure has been explained and brief explanations of each chapter's content have been provided. This chapter has also clarified the scope of the study to assist the readers in following the chapters easily and smoothly.

The following chapter will outline the theoretical and conceptual foundation of the thesis which is formed by reviewing the relevant literature.

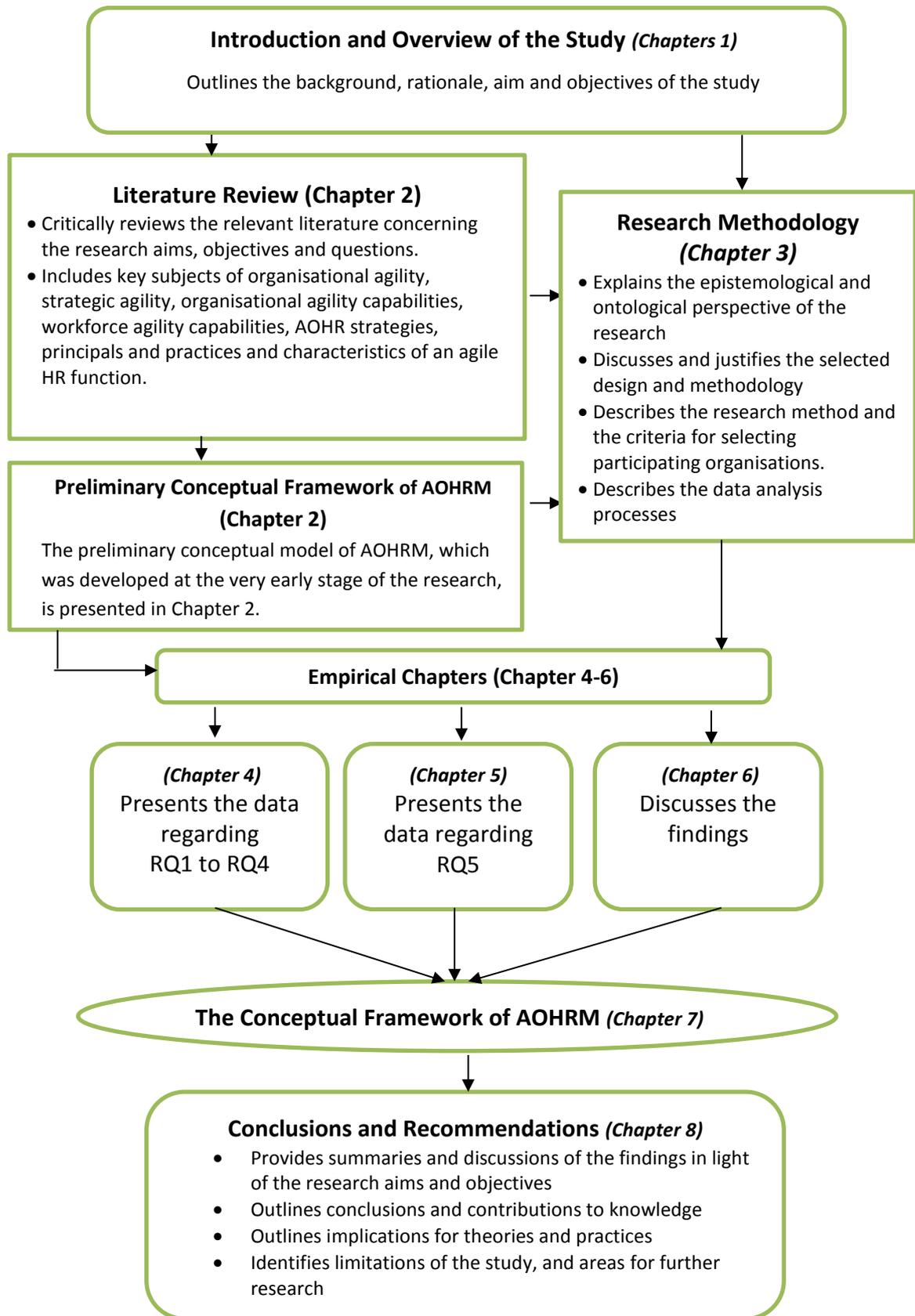


Figure 1.1: Thesis Structure

CHAPTER TWO
A REVIEW OF THE LITERATURE

2.1 Introduction

This chapter reviews the literature associated with the human aspects of organisational agility, which incorporates a broad range of titles including strategic agility, agility capabilities, workforce agility, workforce agility capabilities, and agility-oriented HRM strategies, systems, principles and practices

2.1.1 Literature Search Strategy, Selection Criteria, Inclusion and Exclusion

In pursuit of the research aims and objectives and in answering the research questions, which are outlined in chapter one, an interdisciplinary approach was adopted. So, the research reviewed and synthesised the most relevant and influential studies about the human aspects of OA, in the areas of strategic and organisational agility, agile manufacturing and supply chain agility, strategic management, SHRM, and organisational dynamic and change to obtain the necessary background and knowledge in pursuit of each objective of the research.

As part of this, it critically reviews 26 years of agility and three decades of SHRM theories and research to:

- Develop an understanding of the human aspects of organisational agility
- Identify the human factors that are critical to the achievement of agility
- Explore how HR function can contribute in achieving organisational agility,
- Delineate the key HR roles
- Identify main constructs and features constituting the HRM supportive for agility and relationship between these factors.

While the initial intention was to focus only on research published in journals and books, due to a limited state of knowledge regarding the subject, research findings published in the forms of conference proceedings, working papers as well as PhD dissertations are also included in this review.

The review started in February 2012, firstly exploring agility literature, searching for all articles published since the original introduction of the concepts by the Iaccoca Institute in

1991 until the present, containing the keywords *agility/agile* in their titles, abstracts or keywords. This resulted in a large number of articles, covering the broad subjects of agile manufacturing, supply chain agility, agile enterprises, leadership agility, strategic agility, organisational agility and workforce agility. The majority of these articles were about strategies, tools and enabling technologies for agile manufacturing (AM). Searching for the keywords of *people/HR/ Human Resource/workforce* anywhere in the documents' texts, only a limited number of these articles discussed the human aspects of agility and were truly concerned with the research core questions. Thus, the agility articles are categorised into three groups:

- 1- Articles without addressing human elements
- 2- Articles which highlighted the importance of human factors in agile organisations with some limited insight into the core subjects of the research
- 3- Articles focusing on human elements of agility which identified workforce agility attributes and elements of AOHRM

Group 1 studies, which were broader in their scope, addressed the overall dimensions of agility or proposed assessment tools or methodologies for implementation. However, they gave less attention to specific human issues. Although these studies were important to the agility field in general, they did not directly inform the present research with necessary insight about people dimensions, and would not contribute to an understanding of human aspects of agility. Therefore, this literature review particularly concentrates on literature from groups 2 and 3. Among the articles/studies from group 2 and 3, which met the criteria for full inclusion in this study, only a small number belong to group 3, and can be labelled as the core studies of the HR Agility. (see Appendix A1 for more details about core studies on the subject)

It is important to mention that this review inevitably moved beyond the core literature as certain concepts were rooted in other literature streams. In order to fully comprehend the dimensions of those concepts, the literature from other domains are also included where necessary. In particular, the literature on relevant subjects such as change management, organisational culture, organisational structure, and leadership are also studied for the purpose of discovering how these concepts have evolved in line with the agility concept. In addition,

the literature review also includes studies relevant to similar (not identical) organisational paradigms such as organisational resilience, learning organisations, organisational flexibility, dynamic organisations, and workforce adaptability. These literatures were reviewed in the search for ideas that could be utilised to understand the concepts of workforce agility and AOHRM.

The initial review of the above core studies, in addition to the review of emerging perspectives of strategic management revealed that the HR-agility literature leaves important questions about the embracement of agility by HRM unaddressed. Thus, in the next step, the 30 years SHRM literature was reviewed, searching for articles which were concerned with issues of agility, responsiveness, flexibilities, dynamic capabilities and environmental dynamics. Again, as the SHRM field constitutes a vibrant and vast literature in its own right, this review specifically focuses only on articles that study SHRM in the context of environmental dynamics and provide insight about the HRM role in enhancing the responsiveness and agility of the firms.

2.1.2 Structure of the Chapter

To provide a basis for understanding the importance of adopting an agility strategy, the chapter first reviews the issues related to the emergence of new conditions in business environments characterised in concepts such as hyper-competition, hyper-turbulence, and continuously morphing business environments. It then discusses how strategic management paradigms and theories have been updated in response to the increasing turbulent environment and introduces agility as an appropriate strategy for competing and surviving in today's increasingly competitive, dynamic and uncertain business environment.

Then, a brief history of the concept of agility and its definitions will be discussed followed by an overview of the various models proposed for achieving agility and an introduction to organisational agility capabilities. The chapter continues by discussing the implications of agility strategies for the workforce, aiming to investigate how agility affects the expectations of the workforce. Then the concept of workforce agility, its importance, and its determinants will be reviewed.

To investigate how SHRM theories and literature have responded to the new conditions in the business and the requirements of agility strategy, a review of SHRM literature was conducted, and subsequently the chapter provides a review of and discussions on the following issues: The importance of AOSHRM and a discussion of the previous conceptualisations of the subject and proposed frameworks; AOHRM and its new roles and mission; AOHR principles and practices; Agility of HR function.

Then, based on the recent advances in the change and strategic management literature, the chapter highlights how SHRM research has so far not considered the dynamic nature of HR strategy, HR systems and their underlying practices and routines. This is followed by a summary of the identified gaps and shortcomings in the SHRM-agility literature. The chapter next presents the preliminary conceptual framework for AOHRs, and ends with a summary of the discussed issues.

2.2 Emergence of Turbulent Business Environment and Strategic Management Theories in Response

Whilst change has always been a concern for strategic management, the increasing degree of uncertainty, complexity, and turbulence that organisations have been experiencing during the past few decades, have motivated theorists to propose alternative strategic approaches appropriate for these emerging business environments (Weber and Tarba, 2014; Worley et al., 2014).

To understand why the conventional strategic approaches are considered inappropriate in accommodating the above environmental conditions (Lengnick-Hall and Beck, 2005), it is necessary to further examine the nature of change and uncertainties and to provide a more accurate portrait of environmental change. According to Sharifi (2014), the perceived range of changes and uncertainties in the business environment can be put along a continuum ranging from linear and stable change, to dynamic- nonlinear with hyper- competition, to hyper-environment with complex and turbulent conditions (See Figure 2.1). Accordingly, several perspectives on strategy making have been introduced in response to each of the above conceptualisations, which are categorised and explained in Table 2.1.

As Figure 2.1 and Table 2.1 show, mainstream strategy management theories assume a linear reality (Abbot, 2001) and stable changes in the markets and competition, based on which an equilibrium in market condition is achieved or will be achieved. Approaches such as those advocating a static orientation to the strategic management of the firm, encourage achievement of a strategic alignment (fit) with the external or internal contingencies that a firm is facing (Sharifi, 2014).

The next state of change is linear but dynamic changes (Sharifi, 2014.) Theorists under this category, although they recognise the dynamic and continuous nature of environmental changes, they still presume that environmental conditions are planned and predictable and will move from an equilibrium state to a new equilibrium (such as Chakravarthy, 1982; Zajac and Kraatz, 1993)

However, since the early 1990s, driven largely by globalisation and technological advancements, environmental conditions have presented some relentless shifts, which have been characterised by frequent discontinuities and aggressive competition. These new trends have replaced the general assumption of linear reality with an unprecedented and fluid reality, and has led the theorists to theorise beyond the general equilibrium model and to adopt concepts such as dynamic capabilities (Teece et al., 1997; Eisenhardt and Martin, 2000) and complex adaptive systems (Meyer et al, 2005).

Accordingly, the issues of environmental jolts, environmental turbulence and hyper-competition have been recognised and theorised. For instance, ‘hyper-competitive’ is defined by D’Aveni (1994) and Eisenhardt and Tabrizi (1995) as high-velocity environments that are in perpetual flux, which call for a major shift in the focus of strategy and accelerated strategic interactions among competitors. Similarly, Meyer (1982:515) defined ‘environmental jolts’ as “transient perturbations whose occurrences are difficult to foresee and whose impact on organisations are disruptive and potentially inimical”.

Another state of change and uncertainty is identified as a complex and turbulent business environment, named as hyper-environment, which is theorised based on the socio-ecological perspectives of strategy (Selsky et al., 2007) and complexity theories (Sharifi, 2014).

Under the socio-ecological approach, the boundary of focus is a shared field of inter-organisational action. Thus, while conventional strategies view turbulence as a characteristic of an individual organisation's environment, socioecological theorists consider turbulence as a trait of a shared field of strategic actions which need to be managed jointly (Slesky et al., 2007).

These new situations in the business environment have stimulated new approaches to the strategic management of firms, as it has been asserted that conventional strategies such as Chakravarthy's adaptive fit (1982), do not sufficiently accommodate the full spectrum of the above environmental conditions. Organisations have also been seeking new management principles to attain the required capabilities to thrive in such turbulent environments (Hamel, 2012; Hatum, 2013). Accordingly, alternative strategic approaches have been introduced such as dynamic capability (Teece et al., 1997; Eisenhardt & Martin, 2000), robust transformation (Lengnick-Hall and Beck, 2005), resilience capacity (Hamel and Valikangas, 2003; Lengnick-Hall and Beck, 2005; McCann, 2004), and strategic agility ((McCann, 2004; Doz and Kosonen, 2007; Lengnick-Hall and Beck, 2009; McGrath, 2013) which is the focus of this study.

This section introduced a range of strategic approaches suitable for different types of change and uncertainty. The next section will introduce "agility" as an appropriate strategy for addressing strategic management issues in the new context of business, characterised by of uncertainty, continuous change, turbulence, hyper-environment and transient advantages. It will also present agility as an appropriate paradigmatic approach to integrative strategy making, where a blend of alternative and complementary strategies can be adopted to address various types and degrees of change and uncertainty.

Table 2.1: The range of strategic approaches suitable for different types of change and uncertainty, adopted from Sharifi (2014)

Strategic Approach	Underpinning Assumptions and Theoretical Basis
Contingency Based: 1- Conventional Congruency-Based View	<ul style="list-style-type: none"> • Aims to align the organisation with the market and partially the business environment (e.g. Smith and Grim, 1987) by following a path of ‘<i>Strategic Fit</i>’ with the environmental or organisational contingencies (Andrews, 1971; Zajac et al., 2000) to provide a required degree of congruence between market and internal resources. • Strategic fit is primarily associated with classical contingency theories (Venkantraman and Camillus, 1984; Zajac et al., 2000), which are later challenged by resource based perspectives leading to the introduction of strategic change as a complementary perspective for sustained alignment of the organisation with changes in the business environment. • <u>Limitations</u>: too static, limited in their consideration of dynamics, and their analytical ability to consider a larger range of factors (Venkantraman and Camillus, 1984; Smith and Grimm, 1987; Zajac et al., 2000; Lengnick-Hall and Beck, 2005).
Contingency Based: 2- Adaptive Fit	<ul style="list-style-type: none"> • <i>Adaptation</i> perspective (eg. Chakravarthy’s (1982) Adaptive Fit), replacing congruence and alignment to provide a more unique and dynamic approach to <i>Strategic Fit</i> • Assumes equilibrium as the ideal position, and move from one equilibrium to another via <i>Adaptation</i> and <i>Contingent Fit</i>. • Assume a logical relationship between environmental change and organisational activities (Lengnick-Hall and Beck, 2005) • <u>Limitations</u>: Struggle to stand the emerging circumstances in the business environment. Moreover, shift from one equilibrium to another is not a realistic assumption, and therefore matching the change through one of the postures or shielding against fluctuations, which may be as dramatic as jolt and complexity, cannot be achieved through adaptation (Lengnick-Hall and Beck, 2005)
Dynamic Capability-Based Approach	<ul style="list-style-type: none"> • Aims to prepare <i>Transient Strategies</i> for transient conditions in the business environment. This is also termed as <i>Robust Transformation</i> by Lengnick-Hall and Beck (2005), who consider resilience and strategic agility as key factors for producing and implementing such strategies. • Necessary for responding to nonlinear, dynamic and complex circumstances which are standing on a very different set of assumptions. • Robust transformation is a complementary posture to adaptive fit, and as concluded by Lengnick-Hall and Beck (2005:749) “when environmental change is equilibrium to equilibrium, organisations should strive for adaptive fit. Moreover, when environmental change is either very temporary or continuous, organisations should strive for robust transformation”.
Field and Network Focused	<ul style="list-style-type: none"> • Following the <i>Socio-Ecological Perspective</i>, aims for collaborative strategy development through co-evolution and knowledge networks. Strategy making process involves engagement of various actors in making decisions. Deliberation and dialogue should be pursued in order to generate normative common grounds, and to collaborate in innovating new processes which will help to stabilise the extended field. (Doz and Babürog 1u, 2000), • Considers a generative dynamic nature for change and deals with <i>turbulence</i> and <i>hyper-environment</i> which originate from many interdependent sources in the field of action (Selsky et al, 2007)

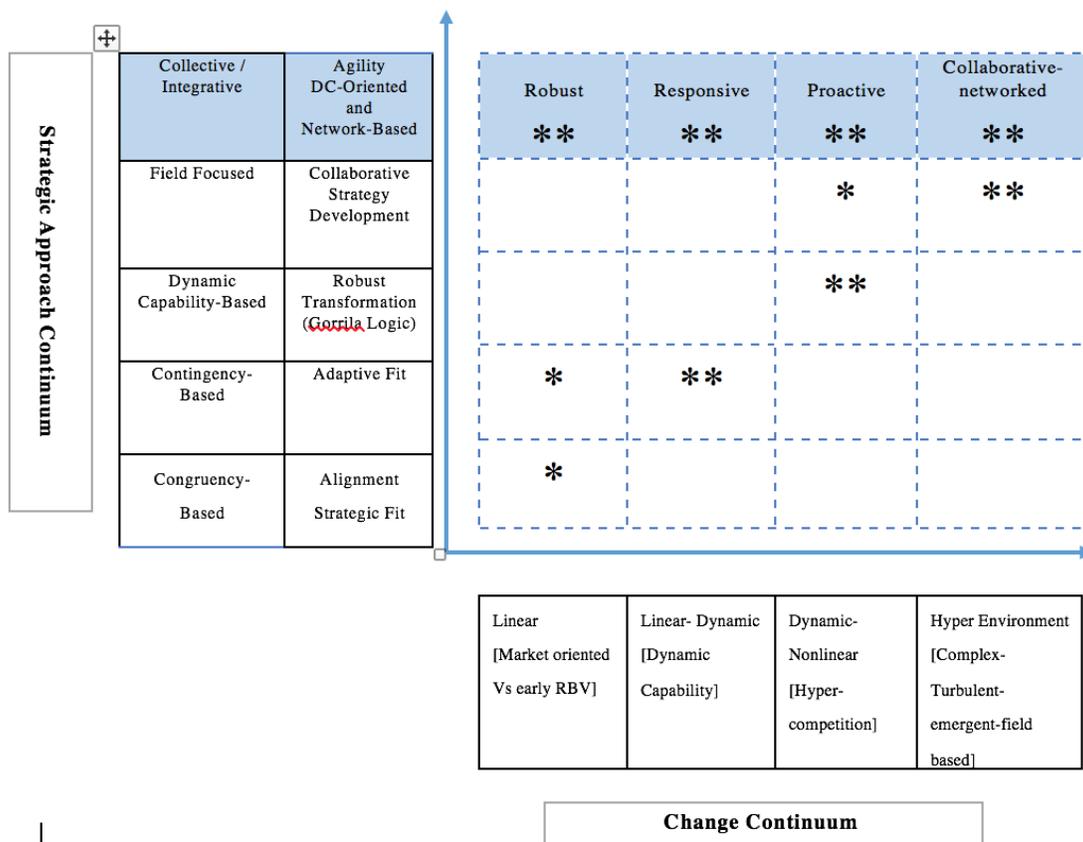


Figure 2.1: Strategic Approach - Business Contexts Suitability Diagram, Source: Adopted from Sharifi (2014) and modified*

*: Fits to some degrees **: Complete theoretical fit

*Sharifi (2014) provided a two-dimensional mapping of ‘Strategies-Environmental Conditions’, exhibiting the current theoretical views on the strategic approach and their suitability for different business contexts. This Figure is a modification of his graph, in which the strategic agility approach is added on the top.

2.3 Agility; A Strategy in Response to the New Conditions of Business

Environment

Agility has been introduced as an appropriate strategy for addressing strategic management issues in the new context of business, characterised by uncertainty and continuous change (Meyer et al., 2005), and transient advantages as the ruling logic of business (D'Aveni, 1994; McCann and Selsky, 1984; Meyer, 1982; McGrath, 2013a, 2013b) where the domain of competition and action is moved from firms to networks and fields (Slesky et al., 2007). In particular, agility strategy has been introduced as an appropriate paradigmatic approach to integrative strategy making (Doz and Kosonen 2008, 2010; McGrath, 2013a, 2013b; Sharifi, 2014).

The integrative strategy making approach has emerged as a response to the key question of whether organisations can follow more than one type of strategy or should pursue one single core strategy. The conventional view, as implied in previous works, (such as Chakravarthy, 1982; Lengnick-Hall and Wolff, 1999; Lengnick-Hall and Beck, 2005) considers distinct and contradictory differences between these strategies arguing that integrating strategies may provoke inconsistencies in an organisation's strategic context, underpinning assumptions and its implementation arrangements. Thus, it assumes a logical relationship between environmental change and organisational responses and advocates a more alternative and competing approach to different strategies. According to this perspective, strategies for responding to different circumstances are mutually exclusive.

The contrasting perspective, following the argument presented by Beinhocker (1999), and also more contemporary views (such as McGrath, 2013a, 2013b) call for a synchronous approach to both stable and dynamic (agile) strategies advocating an integrative approach to strategy making and implementation. In the same vein, Sharifi (2014) advocated the integrative approach, where a blend of alternative and complementary strategies can be adopted matching with the firm's contextual, organisational and transient situation, as well as the fields or networks it is associated with.

It has been stated that agility provides a comprehensive and cohesive platform for addressing

strategic management issues in the age of transient advantage by understanding, interpreting and contextualising uncertainties, change and the contingencies of the firm's business (Sharifi and Zhang, 1999); and also by addressing the dynamics and complexity of the business environment through the perpetual process of altering and adjusting the firm's direction and courses of action (Doz and Kosonen, 2008). It can happen by selecting (an) appropriate responsive posture(s) in accordance with the degree of uncertainty and complexity of a firm's business and internal environment (Lengnick-Hall and Beck, 2009).

These strategic postures represent a continuum of strategic responses ranging from reactive responses to changes (alignment and contingent fit), to responsiveness (calculated response to the faced or anticipated changes- adaptation and move from one equilibrium to the next), to proactive and transformative responses (by manipulating the situation and creating change) (Sharifi and Zhang, 2001). A firm may choose one or a combination of a range of these postures following a careful analysis of its contextual situation. (see the blue cells in Figure 2.1).

In other words, agility offers the potential for pursuing parallel and complementary strategies when necessary, with the opportunity to switch or shift between them in accordance with changing situations. This facilitates the issue of balancing efficiency and effectiveness against flexibility and innovativeness, as well as stability against agility. Considering the transformation journey to agility as a continuous and cyclical process, which can take diverse routes and utilisation of various routines, resources, and competencies, (Sharifi and Zhang, 1999, 2001; Lengnick-Hall and Beck, 2009), firms can achieve different levels of adaptability and agility by focusing on various strategic capabilities such as robustness, innovativeness and proactiveness simultaneously (Sharifi, 2014). Moreover, similar to the routes and process to agility, the resulting outcomes of the journey vary from one firm to another (Sharifi and Zhang, 1999).

Moreover, while emphasis on capabilities (e.g. resilience capabilities (Lengnick-Hall and Beck, 2005), strategic agility (Lengnick-Hall and Beck, 2009; McGrath, 2013a,b), and dynamic capabilities (Eisenhardt and Martin, 2000; Ambrosini and Bowman, 2009)) has been a prevailing perspective among the theoretical views presented for responding to changes and

uncertainties, agility strategy as an integrative approach is considered as encompassing these extant organisational and strategic constructs and theories. According to a review of agility concepts by Sherehiy et al. (2007), the concept embraces existing frameworks and theories such as lean theory, adaptability, flexibility and dynamic capability. Thus, agility strategy combines the principles of the extant theoretical concepts to determine both the content of the strategy as well as the process of formulation and implementation.

Ananthram and Nankervis (2013) define strategic agility as “responsive and timely decision-making, and the implementation of associated business strategies in advance of or in reaction to evolving trends in their external environment”. Jamrog et al. (2006) and Doz and Kosonen (2007) related strategic agility to the ability to “take quick, decisive, and effective actions and that it can trigger, anticipate, and take advantage of change”. Hamel and Prahalad (1993) considered strategic agility as the ability to “demonstrate a consistent capacity for concentrating resources on key strategic issues, accumulating new resources efficiently and effectively, complementing and combining resources in new ways, and redeploying resources for new uses.” (cited in Lengnick-Hall and Beck, 2009:17)

Among the various definitions of strategic agility, Sharifi’s (2014:19) definition is the most comprehensive representation of the above characteristics. “the strategic approach to the continual process of choosing, changing and adjusting the firm’s direction in response to circumstances in the business environment, by relying on dynamic capabilities developed within the firm and its network of accessible resources.” The central aim here is to maintain strategic competitiveness through a continuous renewal of the firm, its business models and organisational and functional strategies.

This section introduced “agility” as an appropriate paradigmatic approach to integrative strategy making, where a blend of alternative and complementary strategies can be adopted to address various types and degrees of change and uncertainty and accommodate the full spectrum of the new environmental conditions such as continuous change, turbulence, hyper-environment and transient advantages. The next section provides some more background for the concept of “organisational agility”, its origin and evolution, and the principles and frameworks presented to achieve agility capabilities.

2.4 The Origin of Agility; Perspectives and Definitions

2.4.1 The early history of agility

Agility as a Business Paradigm emerged as a continuation of the quality evolution theories and lean manufacturing concepts within manufacturing industries in the early 1990s. The concept was first introduced in a report from the Iacocca Institute, Lehigh University in 1991, pre-released by Nagel and Dove (1991) with the name of “21st Century Manufacturing Enterprise Strategy: An Industry-Led View”. The report calls for agile manufacturing strategies to enable US industries to make the transition from mass production manufacturing to the agile manufacturing system with the capability to shift quickly among product models to meet the rapidly changing customers’ demands. The concept, then became popular within the manufacturing industries in the early 1990s and was extended into the range of business sectors and a wide range of disciplines including supply chain management, and information and communication technology (IT & ICT) (Breu et al., 2002; Sarker et al., 2009).

2.4.2 Different Perspectives and Definitional Landscape

Although agility has been widely accepted as a new competitive concept during the last 26 years, there are still confusions about the meaning of agility and its theoretical positions within management studies. Much of the agility literature considers agility as a ‘new manufacturing paradigm’ following the original introduction by the Iacocca Institute (Sharp et al., 1999; Yusuf et al., 1999; Zhang and Sharifi, 2000; Sanchez and Nagi, 2001; Brown and Bessant, 2003). While many agility authors agree about the characteristics of agile organisations and even the strategic capabilities relating to agility, no agreement yet exists clarifying the theoretical position of the concept as a strategy, capability, dynamic capability or ability. Thus, agility has continued to remain as a concept rather than a reality in industry (Zhang and Sharifi, 2007).

The common ground in literature is to refer to agility as a ‘capability’ or a ‘strategic capability’ to respond to dynamic customer requirements and change in the business environment (such as Goldman et al., 1995; Vokurka and Fliedner, 1998; Gunasekaran, 1999;

Lengnick-Hall and Beck, 2009). More recently, McGrath (2013b) considered agility as the necessary ‘strategy’ for organisations dealing with an increasingly complex, uncertain and turbulent business environment embracing the condition of transient competitive advantage.

Agility, therefore, can be contemplated as a ‘strategy’, employed to facilitate a wide range of strategic directions and actions for the organisations through enhancing/capitalising on extant sources of competitive advantage, or by generating entirely different sources of advantage through discontinuous innovations. Since the concept developed in response to environmental uncertainty and complexity, it can take distinct patterns of strategic directions encountering different degrees of complexity and turbulence.

Some definitions of agility have been provided in Appendix A2. Although the table does not provide a comprehensive collection of agility definitions, the presented definitions can effectively represent the existing definitions in agility literature. The review of the agility concept also indicated that agility is often confused with other paradigms such as lean, flexibility, adaptability, or resilience. Moreover, no defined boundaries exist among the concepts.

Similarly, Sherehiy et al. (2007) reported confusion regarding the definitions and constituents of the three concepts of ‘adaptability’, ‘flexibility’, and ‘agility’. While some authors sharply differentiate these concepts, the three terms are used synonymously by many researchers who have studied the issue of dealing with turbulent and unpredictable business environments (Sherehiy et al., 2007). He asserts that although these three phrases concern the development of the notion of adjusting to changes, agility is the latest stage of this evolution comprising all of the principles and theories that have evolved under the scope of adaptability and flexibility frameworks.

Elaborating on the reviewed definition of agility in this section and strategic agility in the previous section, this research adopts the definition provided by Sharifi (2014:19). This definition and the presented framework for agility strategy, which will be discussed in section 2.5.1, are the conceptual basis on which the research framework for AOHR strategy will be set up (see Chapter 7). Furthermore, the research approaches agility from an organisational

perspective and assumes agility as an umbrella strategy, encompassing all initiatives aimed at improving organisations' responsiveness to unpredictable changes in their external environments, and embracing all programmes that provide opportunities for an organisation to improve its ability to innovate, as well as its flexibility, speed, and responsiveness.

2.5 Organisational Agility Capabilities

There are many literatures on agility that discuss attributes of agile organisations. However, only few papers conceptualised agility as a strategy and developed an integrated view of the agile organisations. This section reviewed these works in order to identify main capabilities of agile organisations.

Although, it has been argued that strategic agility can take different forms and can be achieved through different pattern of routines, capabilities, and resource deployments according to the different levels of market turbulence (Lengnick-Hall and Beck, 2009), the literature indicates some overarching capabilities which provide foundations for creating different forms of agility in response to various market conditions (Nejatian and Zarei, 2013).

Table 2.2 introduces and summarises the core organisational capabilities for agility.

Reviewing these capabilities, alertness and responsiveness, or sensing and responding appeared as a common theme in literature, as prerequisites for organisations performing in rapidly changing environments (also seen in Zaheer and Zaheer, 1997; Overby et al, 2006; Van Oosterhout et al, 2006), with Overby et al (2006) considering them as symbiotic, arguing that without a capability to respond, a sensing capability would add no benefit and vice versa. Thus, agility is commonly associated with a capability to sense and interpret early signals of change and to respond to these quickly and effectively.

In summary, the identified organisational capabilities for agility include strategic sensitivity for sensing the market (Dyer and Shafer, 1999 and 2003; Doz and Kosonen, 2008); leadership unity and decision making prowess to mobilising rapid responses (Dyer and Shafer, 1999 and 2003; Doz and Kosonen, 2008; Lengnick-Hall and Beck, 2009); resource fluidity (Doz and Kosonen, 2008) or as put by Lengnick-Hall and Beck (2009) a flexible resource base to exploit temporary advantage (Dyer and Shafer, 2003); learning aptitude (Dyer and Shafer,

1999 and 2003; Lengnick-Hall and Beck, 2009); and resilience capacity (Lengnick-Hall and Beck, 2009).

The next section will review some of the agility and agile manufacturing frameworks to identify how organisational capabilities for agility can be achieved.

Table 2.2: Organisational Capabilities for Agility

Reference	Capabilities	Definition
Sharifi and Zhang (2000) (Zhang and Sharifi, 2007)	Responsiveness	Sensing, perceiving and anticipating changes. Immediate reaction to changes. Recovering from changes.
	Competency	Strategic vision. Appropriate technology, or sufficient technological capability. Products/service quality. Cost- effectiveness. High rate of new products introduction. Change management. Knowledgeable, competent, and empowered people. Operations efficiency and effectiveness (leanness). Co-operation (internal and external). Integration.
	Flexibility	Product volume flexibility. Product model/configuration flexibility. Organisation and organisational issues flexibility. People flexibility.
	Speed	Quickness in new products time-to-market. Quickness and timeliness in products and services delivery. Quickness in operations (short operational lead-times).
	Proactiveness	The capability to act proactively instead of reactively (in attacking threats and opportunities).
	Customer Focus	The capability to have a strong customer focus.
	Partnership	The capability to form concrete relationship with suppliers and to partner.
Doz and Kosonen (2008:96)	Strategic Sensitivity	The sharpness of perception and the intensity of awareness and attention which requires early and keen awareness of upcoming trends and real-time sense-making in strategic situations (also in Worley et al., 2014).
	Leadership Unity	The ability of the top management team for fast decision making, and quick and effective implementation
	Resource Fluidity	The internal capability to reconfigure business systems and redeploy resources rapidly.
Lengnick-Hall and Beck (2009)	Decision Making	“Unified managerial commitment and strategic acuity enabling key leaders to identify and appreciate opportunities and threats” (Lengnick-Hall and Beck, 2009:20)
	Prowess	
	Learning Aptitude	“Adept learning, unlearning and knowledge exploitation capabilities” (Lengnick-Hall and Beck, 2009:20)

	Flexible Resource Base	“Fluid resources that can be mobilised, reassembled, and redeployed to meet differing needs” (Lengnick-Hall and Beck, 2009:20)
	Resilience Capacity	Conceptualised by Lengnick-Hall and Beck (2005, 2009), as an antecedent to strategic agility which enables a firm to “effectively absorb, respond to and potentially capitalise on disruptive surprises”. This organisational capacity results from interactions between three particular cognitive, behavioural, and contextual properties which are crucial in understanding the situation and developing customised responses. (Lengnick-Hall and Beck, 2009:4)
(Dyer and Shafer, 1999 and 2003:12-14).	Sensing The Market	“The ability to scan external environments, locate and analyse emerging developments, and quickly turn the resulting information into actionable decisions (Mara and Scott-Morgan, 1996; Teece et al., 1997).”
	Mobilising Rapid Response	“The capacity to quickly and easily make decisions, translate these decisions into action, and choreograph the essential transitions (Brown & Eisenhardt, 1998) More often, it involves making major changes: adding, adjusting, or even cannibalizing products or services; scrapping tried and true business models to pursue newer, riskier versions; and totally revamping key business processes (Hamel, 2000).”
	Exploiting Temporary Advantage	“The capacity to quickly and easily enter new markets and to deliver competitively priced products or services to these markets as long as, but not longer than, they remain the most attractive options on the horizon.” (Dyer and Shafer, 2003:13). Similarly, Lewis et al. (2014) and Worley et al. (2014) assert that agile organisations are able to manage the paradoxical challenge of balancing present and future performance.
	Embedding Organisational Learning	“The inherent capacity to constantly create, adapt, distribute, and apply knowledge (Grant, 1996; Levine, 2001; Nonaka, 1991). Learning, in this context, can take two types (Morgan, 1997) including adaptive or single-loop learning, “which is aimed at making continuous improvements in current operations” and generative or double-loop learning, “which requires employees at all levels to question all aspects of a business including its fundamental operating principles, core values, and even strategic direction and vision.” (Dyer and Shafer, 2003:14).

2.5.1 Frameworks for Achieving Agility Capabilities

There is a large number of publications on agility, particularly agile manufacturing that are concerned with the strategies, manufacturing practices and tools to build agility capabilities (Sanchez and Nagi, 2001; Gunasekaran and Yusuf, 2002; Zhang and Sharifi, 2007).

Moreover, a large number of methodologies and frameworks for achieving manufacturing agility have been proposed in agile manufacturing literature which are mainly focused on the four categories of technology, people, systems and strategies (e.g. Kidd, 1994; Goldman et al., 1995; Yusuf et al., 1999; Gunasekaran, 1998 and 1999; Zhang and Sharifi, 2000). This section provides a brief review of some of the significant frameworks to identify how organisational capabilities for agility can be achieved.

For instance, Kidd (1994) asserts that agility can be developed through the integration of organisation, people, and technology into a coordinated, interdependent system. The author proposes that a combination of innovative managers, skilled and empowered employees, and advanced technology can lead to the achievement of agility.

Goldman et al. (1995) proposed four agility dimensions which can be considered as main strategies for achieving agility: enriching customers, cooperating to enhance competitiveness, organising to master change and uncertainty, and leveraging the impact of people and information. Similarly, Plonka,(1997) suggests that organisations can develop agility by leveraging employee knowledge, by building virtual companies and partnerships, and by utilising flexible manufacturing technology.

Forsythe (1997:3) suggests agility can take many different forms. However, some common elements exist within different forms of agility which include:

- (1) “Changes in business, engineering, and production practices;
- (2) Seamless information flow from design through production;
- (3) Integration of computer and information technologies into all facets of product development and production processes;
- (4) Application of communications technologies to enable collaborative work between geographically dispersed product development team members; and

(5) Introduction of flexible automation of production processes.”

Abair (1997) similarly proposed that agility not only needs changes in production technology and production systems, but also requires the integration of “ multi-disciplinary teams, supply chains, flexible manufacturing technology, computer-based information systems, and modular production facilities” (in Lei et al., 2011).

While most of the authors consider agility as a uniform construct, Lengnick-Hall and Beck (2009) argue that organisations require different forms of agility to take advantage of the various environmental situations. Accordingly, strategic agility can be achieved through various routines, processes and resources, different dynamic capabilities, and various combinations of competencies, depending on the market conditions and diverse strategic purposes. Correspondingly, they introduced four forms of strategic agility designed for different market conditions and various strategic purposes as Figure 2.2 shows, and argued that organisations should develop a portfolio of these approaches over time to be able to respond to the various competitive realities.

Figure 2.2: Four Forms of Strategic Agility, Source: Lengnick-Hall and Beck (2009:37)

		Market Conditions	
		Evolving Market	High-Velocity, Turbulent Market
Strategic Issue	Sustaining Technology and Complimentary Shifts	Form 1 – Complementary Augmentation Persistent dynamic capability routines Complexity reduction Competence-enhancing strategy to continuously nurture and develop current strengths <i>(same value proposition – same means)</i>	Form 3 – Innovative Elaboration Fluid dynamic capability routines Complexity absorption Competence enhancing strategy that makes current strengths more fungible and more easily applied to alternate uses <i>(same value proposition – different means)</i>
	Disruptive Technology and Discontinuous Shifts	Form 2 – Breakthrough Conversion Persistent dynamic capability modules & subroutines Complexity reduction Competence-destroying strategy that periodically redefines the basis for value creation <i>(new value proposition for emerging market – same means)</i>	Form 4 – Radical Improvisation Fluid dynamic capability modules & subroutines Complexity absorption Competence-destroying strategy that increase variety, tempo, and unpredictability of strategic actions, business models, and value propositions <i>(new value proposition for emerging market – new means)</i>

Zhang and Sharifi (2000) proposed a methodology for achieving agility, which is broadly cited and recognised as holistic and concise by many authors including Sherehiy (2007). The framework, shown in Figure 2.3, includes the identification of agility drivers and the necessary agility capabilities to cope with the drivers and finally the determination of agility providers to achieve the desired capabilities. Agility providers include a synthesised list of generic practices (not specific to a certain type of operation or circumstance) concerning technology, people, organisation, continuous innovation, relationships with suppliers, competitors and customers, supply chain integration, and information systems (Zhang and Sharifi, 2007).

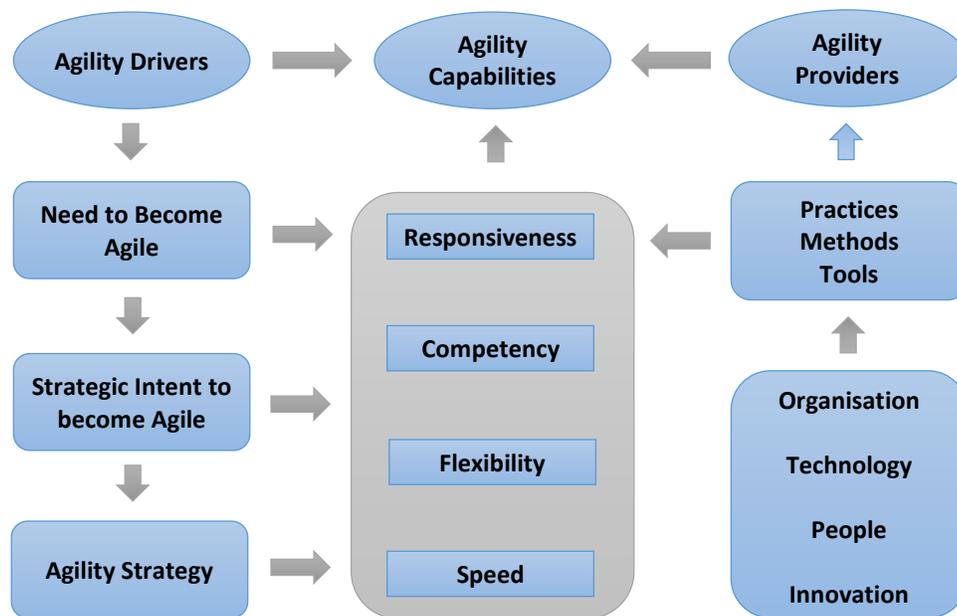


Figure 2.3- The Conceptual model of agility: Source (Zhang and Sharifi, 2000:498)

Sharifi (2014) presents a modification of the above model, in an attempt to adopt a strategic management perspective to agility. Similar to the original model, the new framework (shown in Figure 2.4) has three main constructs including agility drivers, agility enablers (or strategic capabilities) and agility providers.

Agility drivers are contextual drivers including the characteristics of the external business environment which define and lead the strategic position of the firm with regard to its business environment. The author identified three forms and origins for agility drivers as Table 2.3 presents. The firm's strategic position can be a point on a spectrum from stable and linear

changes to a hyper and turbulent environment, as shown in Figure 2.1. Consequently, this position specifies the level of agility need and determines the appropriate agility posture and the composition of strategies that may be determined as appropriate ranging from stable and risk controlling to proactive, transformative and risk absorbing strategies.

Enablers for agility are organisational capabilities in the form of fundamental capabilities or dynamics and process-based capabilities, as well as resilience capacity which provide the required abilities for responding to change and turbulence.

Agility providers refer to the means (organisational practices from areas including organisation, people, technology, and innovation) by which the required capabilities could be achieved.

Table 2.3- Different Forms and Origins of Agility Drivers. Source: Sharifi (2014:17)

Changes in the business environment such as markets, customer expectations, competition and its dynamics, technology, policy related rules and regulations.
Institutional changes including public sphere and governance, globalisation, human resource dynamics and mobility, virtual social networks.
Socio-ecological complex and emergent changes resulting from dynamics of systems and fields and inter firm relational issues, referred to as structuration theory based changes.

The framework explains how the strategic action should be selected through an analysis of the signals and information from agility drivers, translated to the required agility enablers (capabilities and resilience), which, once in place, are supported by the providers and practices (Sharifi, 2014). According to the author, the strategic response to the agility drivers, can be a single or a blend of postures ranging from a reactive, to responsive, to a proactive response to changes as Figure 2.4 shows.

- Reactive posture: such as alignment and contingent fit strategies
- Responsive posture: is a calculated response to the faced or anticipated changes such as adaptation strategies and moving from one equilibrium to the next
- Proactive posture: is a transformative response by manipulating the situation and creating change.

He argues that firms should develop a network and stakeholder oriented strategy portfolio, in terms of the business environment circumstances, dynamics of systems interrelations, and combination of resources, and asserts that such a portfolio accommodates a state of continuous but managed change.

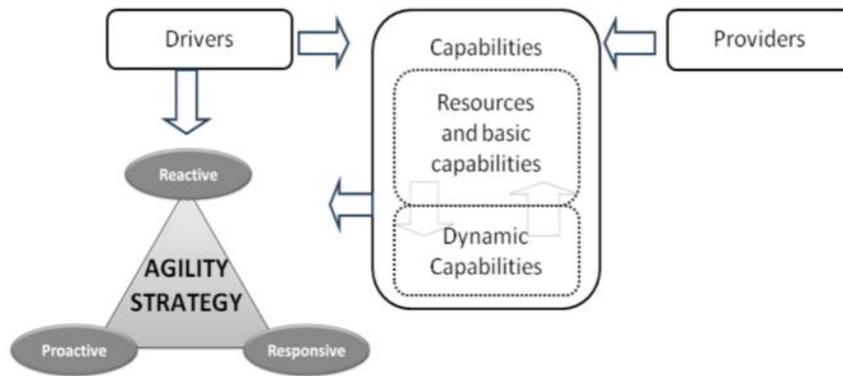


Figure 2.4 - Agility Strategy Framework by Sharifi (2014:18)

Developing an understanding of the organisational capabilities for agility and the strategies and frameworks to obtain these capabilities are the initial steps toward achieving the research's aims and objectives. This section provided a very brief review of the existing frameworks for achieving organisational agility capabilities. Among these works, framework developed by Sharifi (2014) along with the definition provided for strategic agility by Sharifi (2014), are selected as the conceptual basis for the research 'AOHR strategy and model' for several reasons as described below:

The framework provides a mature foundation for strategy making and implementation in turbulent environments, addressing both the process and content aspects of strategic management, while considering structural and infrastructural aspects of the organisations. In addition, its integrative approach allows for employing and combining the emerging strategic management perspectives such as dynamic capability and complexity and socio ecological views with the classical theories of strategic alignment or structural-contingency. Similarly, the integrative perspective allows for adopting both efficiency and innovation oriented strategies, following an interpretation of the firm's dynamic context into strategic position, direction and action.

2.6 Agility and Its Implications for the Workforce

Shifting from a traditional strategic approach to the agility strategy increases the expectations from the workforce in many aspects of business. Agility strategies demand that the workforce along with other key components of enterprise such as organisation and technology, to become flexible and adaptable, responsive, fast and integrated (Sherehiy et al., 2007). The following sections provide some examples of issues that are different for people in agile organisations. However, the issues are discussed mainly in line with an agile manufacturing perspective.

Gunasekaran (1999:97) distinguishes between the requirements of the workforce in agile manufacturing and traditional operations and argues that these requirements prescribe new attributes for the workforce and specify a new set of training and development needs: “closer interdependence among activities; different skill requirements, usually higher average skill levels; more immediate and costly consequences of any malfunction; output more sensitive to variations in human skill, knowledge and attitudes and to mental effort rather than physical effort; continual change and development, and higher capital investment per employee, and favour employees responsible for a particular product, part or process (Pinochet et al., 1996)”

Dove (1993) highlights the importance of improving the workforce’s skills and capabilities for a quicker response to ‘unpredictable change’, hiring people with necessary skills, instituting self-direction and continuous learning, and reconfiguring team structures to accommodate new projects. Likewise, Plonka (1997) suggests that employees in a changing business environment experience higher levels of uncertainty, so they are required to manifest responsiveness to unanticipated events.

The second issue is related to the strategy for enriching the customer as suggested by Goldman et al. (1995). According to Nagel and Dove (1992), to enable the rapid product development and modification, among other technology and design-based factors, it is necessary to form inter-disciplinary project teams who are capable of developing product designs and manufacturing process specifications concurrently. Project members should be

able to acquire the necessary information rapidly, and share it with geographically distributed internal and intercompany teams.

In addition, one of the key expectations from an agile workforce is to participate in many collaborative work settings including internal cross-functional project teams, virtual organisations, and collaborative ventures with external firms (Forsythe, 1997; Van Oyen et al., 2001). Similarly, Goldman et al. (1995) argue that people in agile companies are expected to cooperate well on cross-functional intra-enterprise and inter-enterprise teams, as well as cooperating with external companies, establishing virtual partnerships, and closer collaborations with suppliers and customers are all strategic means to leverage resources, accelerate technology transfer and to enhance the capability to find innovative solutions to problems.

Plonka (1997) suggests that agile manufacturing involves customers more closely in product design and other organisational issues. Thus, the workforce is expected to interact more closely with suppliers and customers and learn from other teams both inside and outside the organisation. Likewise, Crocitto and Youssef (2003) believe that networking among organisational members, leaders, suppliers and customers is essential to responsiveness and flexibility and eventually the survival of an organisation in the era of boundary less careers. They highlight the information and interpersonal aspects of the organisational-customer relationship, by arguing while organisations rapidly meet customised product specifications, organisational members should meet the customer's needs in terms of speed and quality in the delivery of services.

Sherehiy et al. (2007) argue that although the IT, communication and mobile technologies assist employees in taking accelerated actions, they increase time pressure and cognitive demands. Moreover, Bhattacharya and Wright (2005), point out the fast rate of change in technology and argue that this creates a risk for the firm when an employee is unable to keep up with these changes or is unable to learn new skills.

In a like manner, Gunasekaran (1999) argues that in an agile manufacturing with technology and IT-intensive product development, enhancing the productivity of knowledge workers is

essential to the effective integration of agility-enabling technologies with the organisation and its people. Correspondingly, Plonka (1997) asserts that achieving an agile manufacturing demands a worker-oriented production system, in which the workforce requires a comprehensive understanding of process technology in order to make a greater contribution to the design and improvement of their work place. To achieve this, they should be provided by methods to constantly develop, to make satisfactory business sense. They should be free to move from one level of contribution to the next. He also argues that working in the climate of innovation with the frequent adaptation of process design and technology requires a workforce who possess higher cognitive ability so they can utilise flexible technologies and infrastructure, people who are comfortable with change, new ideas, and new technologies; people who have attitudes towards learning and self-development.

In addition, Forsythe (1997) introduces socio-technical challenges as the most significant issues caused by agile manufacturing. He discusses that in the users of computer-aided design and manufacturing systems have reluctance and hesitation to accept agile business practices and enabling technologies in the firms implemented agile manufacturing. He clarifies it by mentioning about threats posed by agile manufacturing which affect both managers and line workers: Managers will lose much of their power by the empowerment of product development teams and expanded access to information. Line workers have to accept a higher level of responsibility while computerisation and the automation of assembly tasks threaten their job security.

Gunasekaran and Yusuf (2002: 1379) argues that the majority of the existing control and information systems are suitable for traditional manufacturing environments with a static market behaviour and resources. They highlighted the importance of three human-related issues for the successful embracement of AM: “1) the implications of temporary alliances on the enterprise communication and coordination, 2) the influence of a virtual enterprise and physically distributed manufacturing on human relations management, and 3) the technologies and human skills required for the information intensive manufacturing environment.”

In summary, employees in agile organisations should be multifunctional, to incorporate the necessary knowledge and skills for enriching the customer with innovative products and

solutions; dynamic and rapidly reconfigured, to enable organisational flexibility and rapid reconfiguration; cooperative, to facilitate the intra- and extra-organisation cooperation necessary for enhancing competitiveness; and virtual, to provide the company access to an opportunistic alliance of core resources (people and information) and competencies to pursue competitive objectives (Yauch, 2007).

Against this background, several authors concur that an organisation's capabilities for agility are very much embedded in a set of individual level capabilities including employees' skills, knowledge, mindset and behaviours which are labelled as "workforce agility capabilities" in this research.

2.7 Workforce Agility: Its Importance and Discussion of the Previous Works

2.7.1 The Importance of Workforce Agility

Youndt et al. (1996) reported that in the past, the dominant belief was that agility and flexibility can be obtained by the application of sophisticated technologies such as computer-integrated manufacturing (CIM). Yet, current studies prove that people play a more critical role in achieving manufacturing flexibility than technologies (Qin and Nembhard, 2010).

Qin and Nembhard (2010:325) considered workforce agility as "a key aspect of overall enterprise agility" and defined it as "the ability of employees to strategically respond to uncertainty". They believe workforce agility results in better organisational performance under changing and uncertain conditions and provides future opportunities and protections from risks.

Similarly, it has been believed by academics such as Herzenberg et al. (1998), Herzenberg and Wial, (2000) and Hopp and Oyen (2004) that workforce agility can bring a wide range of benefits including quality improvement, faster learning, customer service enhancement and improvement in organisational culture. It also improves productivity, profitability and increases market shares (Goldman et al., 1995.) It also enhances growth in ever-changing competitive markets and improves sustainability in turbulent global business environments (Sherehiy, 2008). Likewise, the results of a study by Alavi (2016) indicated that workforce

agility enhances external manufacturing flexibility, increases new product, mix, and volume flexibility. Also from a knowledge management perspective, Al-Faouri et al. (2014) reported that workforce agility positively impacts upon organisational memory.

It has been stated that organisational agility cannot be obtained without agile people (Kidd, 1995; Goldman et al., 1995; Breu et al., 2002; Crocitto and Youssef, 2003; Jackson and Johansson, 2003; Vázquez-Bustelo et al., 2007; Yaghoubi and Dahmardeh, 2011). For instance, the integration of people with organisational process and advanced technology is the core element of Kidd's (1994) conceptual framework of agile manufacturing. He asserts that when agility is considered as a strategy, the integration of people, organisation and technology into a coordinated and interdependent system will generate a competitive advantage (Kidd, 1994). He also argues that a systemic organisational value, an "interdisciplinary design methodology" and leadership to champion the strategy, are needed to achieve this integration. This section provided some insights about the importance of workforce agility and introduced the benefits that workforce agility can bring to an organisation. The next section will review the literature to investigate attributes of agile workforce addressing the research question two.

2.7.2 Investigating Attributes of Agile Workforce

Several authors have reported the inadequacy and limitation of workforce agility research. For instance, Gunasekaran (1999) indicates that despite the emphasis on agile workforce in agility research, the implications of agile manufacturing on workforce attributes have not been clearly identified. Similarly, Van Oyen et al. (2001) addressed the issue that research on workforce agility is mainly concentrated on the characteristics of the factory shop floor workers and scheduling methods of cross-trained and multi-skilled employees.

Sanchez and Nagi (2001) presented a review of literature on agile manufacturing in which only 3 papers out of 73 identified papers reviewed human factors in agile manufacturing. Likewise, Sherehiy et al. (2007) and Qin and Nembhard (2010) identified limited empirical research dedicated to agile workforce. Similarly, Breu et al. (2002) report that although a range of workforce attributes have been identified in the agility literature, there is no theory identifying its concepts and indicators.

In the same way, Gunasekaran and Yusuf (2002) argued that although human factors play a crucial role in the successful development and implementation of agile manufacturing, agile manufacturing workforce literature is very limited. They related this issue to the lack of a definite framework for identifying the implications of agile manufacturing on workforce characteristics.

This research's review of literature similarly indicates that although the desired attributes of workforce in agile organisations have been outlined by several agility authors, only a few of these studies focused particularly on workforce agility (such as Plonka, 1997; Gunasekaran, 1999; Alworth and Hesketh, 1999; Pulakos, 2000; Breu et al., 2002; Shafer, 1997; Dyer and Shafer, 2001 and 2003; Griffin and Hesketh, 2003; Sherehiy et al. 2007; Sherehiy, 2008; Sherehiy and Karwowski, 2014) and very limited research empirically identified the distinctive characteristics of an agile workforce (Shafer et al., 2001; Breu et al., 2002). Therefore, as put by Dyer and Shafer (2003), the attributes of the workforce, remained as the most *speculative* section of the study.

There is no consistency within different definitions of workforce agility, as characteristics of the concept have been conceptualised in various ways such as attributes (Muduli, 2013), competencies (Dyer and Shafer, 1998; Shafer et al., 2001), capabilities (Breu et al., 2002; Sherehiy et al., 2007; McCann and Selsky, 2012), or mindsets and behaviours (Dyer and Shafer, 2003; Virchez Azuara, 2015). Table 2.4 introduces different studies of workforce agility and summarises the workforce agility characteristics identified within each study:

Table 2.4 -Summary of the Previous Studies on Characteristics of Agile Workforce

Author	Characteristics of Agile Workforce
Quinn, et al (1996)	<ul style="list-style-type: none"> • “Cognitive knowledge or Know-what which is the basic mastery of a professional discipline • Advanced skills or know-how defined as the ability to apply the rules of a discipline to complex real-world problems • Systems understanding or Know-why which reflects deep knowledge of cause-and-effect relationships in complex organisations and the ability to anticipate subtle interactions and unintended consequences • Self- motivated creativity or care-why which consists of will, motivation and the desire to adapt aggressively to the changing external conditions and innovations that tend to obsolesce the other attributes.” (Cited in Shafer, 1997:27)
Forsythe (1997)	<ul style="list-style-type: none"> • Knowledge of team dynamics • Individual information requirements and information flow • Information management and utilisation • Monitoring and assessment of the status of complex, dynamic systems • Compatibility of corporate administrative system and infrastructure support structure • Elimination of human points of failure in infrastructure support
Plonka (1997)	<ul style="list-style-type: none"> • Deal with uncertainty and respond to unanticipated events, • Manual dexterity and cognitive ability • Attitudes towards learning and self-development; • Problem-solving ability; • Being comfortable with change, new ideas, and new technologies; • Having ability to generate innovative ideas; • Accepting new responsibilities • Comprehensive knowledge of process technology in order to make a greater contribution to the design and improvement of their work place • Interact more closely with suppliers and customers • Continuously learn from other teams both inside and outside the organisation. • Higher level of interaction between product and process professionals
Gunasekaran (1999:97)	<ul style="list-style-type: none"> • IT-skilled workers • Knowledge in team working and negotiation • Knowledge in advanced manufacturing strategies and technologies • Empowered employees; self-directed teams • Multifunctional and multi-lingual workforce
Brue et al. (2002:27)	<ul style="list-style-type: none"> • Intelligence <p>“concerns the collective environmental responsiveness of a workforce in terms of its ability to read and interpret external change (e.g. in customer needs, market conditions, emerging business opportunities and competitor strategies), to adjust objectives accordingly and to act speedily in line with the resulting strategic direction”</p>

	<ul style="list-style-type: none"> • Competencies “refers to the acquisition of skills, in particular IT and software skills, management and business process integration skills and their continuous alignment with an evolving business direction. • Collaboration “is the workforce’s capability for collaborating effectively across project, functional and organisational boundaries.” • Culture “concerns the development of an internal environment that capitalises on employee empowerment and rewards local decision making.” • IS capability “refers to the deployment of a flexible IT infrastructure that supports the adaptation of existing IS and the assimilation of new systems swiftly and effectively”
Shafer (1997:6)	<ul style="list-style-type: none"> • “Oriented to bottom line organisational performance (e.g. Understanding the business, being solution-oriented, being (im)patient) • Oriented to the context in which the organisation operates (e.g. being customer-focused, seeing the big picture, having a vision) • Able to work in uncertain time and conditions (e.g., dealing with ambiguity, experimenting, learning on-the-fly) • Being in tune with oneself and what makes one effective (e.g., knowing oneself, understanding others, trusting and being trusted”
Dyer and Shafer (1998:16-18)	<p>Agile Behaviours</p> <ul style="list-style-type: none"> • Take initiative to spot threats and opportunities in the marketplace, reconfigure the organisational infrastructure to focus when and to where they are needed to deal with serious threats and opportunities, and learn (no waiting for permission or instructions to act); • Rapidly redeploy whenever and to wherever resources there is priority work that needs doing; • Spontaneously collaborate (even in virtual teams or organisations) to pool resources for quick results; • Innovate (moving beyond old solutions unless they truly fit); and learn (rapidly and continuously) <p>Agile Personal Competencies</p> <ul style="list-style-type: none"> • Business-driven: visionary, future-oriented, big picture oriented, customer-focused, knowledgeable about the marketplace and the way the business operates, and results-oriented. • Focused: able to set priorities, and develop solutions, take responsibility for the actions taken and possible results, and (im)patient (i.e., simultaneously exhibit a strong sense of urgency and a willingness to let things take their course). • Generative: organisationally adept, open to experimentation, fast learners and applicers of new knowledge, and team players • Adaptive: comfortable with themselves, empathetic, comfortable with ambiguity, comfortable with paradox, and resilient • Values-driven : instinctively behave in accordance with the organisation's core values.
Shafer et al. (2001)	Initiate, adapt and deliver

Dyer and Shafer (2003)	<ul style="list-style-type: none"> • Proactive behaviour: initiate, improvise • Adaptive behaviour: multiple roles assumption, rapid redeployment, spontaneous collaboration • Generative behaviour: learning, educating
Sherehiy et al. (2007: 458)	<p>Proactivity</p> <ul style="list-style-type: none"> • Anticipation of problems related to change. • Solution of change-related problems. • Personal initiative. <p>Adaptivity</p> <ul style="list-style-type: none"> • Interpersonal and cultural adaptability. • Spontaneous collaboration. • Learning new tasks and responsibilities. • Professional flexibility. <p>Resiliency</p> <ul style="list-style-type: none"> • Positive attitude to changes, to new ideas, and to technology. • Tolerance to uncertain and unexpected situations. • Coping with stress.
McCann and Selsky (2012: Table 3-2)	<ul style="list-style-type: none"> • Being purposeful: Positive self-concept with a physically and psychologically healthy presence capable of sustaining them in highly ambiguous, stressful work situations. • Being aware: Active learners with a curiosity about the larger world, open to change and able to make sense and act in ambiguous environments. • Being action- oriented: Confident and competent in taking the initiative, acting or reacting as necessary to gain advantage, avoiding collisions, or minimizing setbacks. • Being resourceful: Entrepreneurial in securing resources, talent, and support required to meet a goal despite the setback. • Being networked: Positive, active relationships maintained within the immediate family, work group, and community to sustain a sense of connectedness and meaning.

Synthesising the reviewed literature on workforce agility, the attributes of agile workforce can be classified into three main categories as: agility-oriented mindset, agility-oriented behaviours, and broader skills and knowledge repertoire as discussed below:

2.7.2.1 Agility-Oriented Mindset and Behaviours

As discussed, strategic agility requires a series of organisational capabilities such as strategic sensitivity for sensing the market, leadership unity and decision-making prowess for mobilising rapid response and exploiting temporary advantage, learning aptitude, resource fluidity and flexibility and resilience capacity. Dyer and Shafer (2003) argued that these organisational capabilities are mainly “people embodied competencies” as they derive more from the mindset and behaviours of employees than leading-edge technologies and include. Thus, every employee (and according to Shafer et al. (2001) all levels and types of employees) should contribute to the achievement of the above-mentioned firm’s strategic capabilities through internalising a supportive mindset and constantly exhibiting appropriate behaviours. This is in tune with the view of Jackson et al. (2014:22), who assert that “Ultimately, explanations for how and why HRM systems contribute to firm effectiveness must address the behaviours of individual employees.”

Dyer and Shafer (2003) defined agility-oriented mindset as a shared mindset when all employees from top to bottom, completely comprehend and embrace the importance and essence of marketplace agility. Understanding marketplace agility means that all employees fully comprehend the challenges of dynamic environments and organisations’ strategies and approaches to thrive in such marketplaces. Embracing the essence of organisational agility means that everyone can articulate the essentiality of organisational agility competencies and capabilities.

The importance of employees’ mindset and behaviours in obtaining desired outcomes and their distinctiveness from skills and knowledge can be supported by an argument by Wright et al. (2001) who assert that eventually it is workforce behaviour that defines how human capital impacts upon firm performance. It is because skill and knowledge would be valueless if employees decided not to utilise them. This highlights the importance of employee motivation

and commitment. Similarly, MacDuffie (1995:199) argues: “Skilled and knowledgeable workers who are not motivated are unlikely to contribute any discretionary effort...”

2.7.2.2 Broader Skills and Knowledge Repertoire

According to Qin and Nembhard (2010), the core of workforce agility is being able to change workforce capacity and capability by training them to excel in timely knowledge and skills. To create workforce agility, it is important to capitalise on a workforce’s skills just ahead of changes (Prahalad and Hamel, 1990), and to frequently predict the necessary future employee skills by constantly evaluating environmental dynamics (Weick, 1979).

Literatures on workforce agility also collectively agree that an agile workforce must have a broader skills and knowledge repertoire. For instance, Goldman et al. (1995:108) believe agile companies need “an agile workforce capable of changing jobs and adding skills as the situation warrants. Not only must workers be familiar with their companies’ services and products, but in the partnering atmosphere of virtual organisations, they may be called upon to provide expertise and skills which vary substantially from those with which they had been accustomed.”

According to Plonka (1997), an agile workforce requires a comprehensive understanding of the process technology and infrastructure that support change. This necessitates an acquisition of knowledge in advanced manufacturing technologies, mobile and collaborative technologies as well as IT skills. In addition to the above technical skills, some other skills have been suggested as essential for agile workforce, these include: group decision-making/problem solving; leadership; understanding the business; and quality/statistical analysis skills (Lawler et al., 1992).

In the same vein, Gunasekaran and Yusuf (2002:1379) contend that agile manufacturing and service needs multidisciplinary skills, which consist of “manufacturing management, computer science, operational research, software engineering, systems design, sensors, mechatronics, robotics, systems integration, virtual manufacturing/services, enterprise integration and management and Advanced Information Technologies.”

This section reviewed and synthesised the literature on workforce agility to identify the attributes of agile workforce addressing the research question two: “What are the characteristics and attributes of people which are central to achieving agility?”. These attributes are identified and classified into three main categories as discussed above. Table 2.5 provide a summary and synthesis of these attributes.

Table 2.5: Attributes of Agile Workforce, A Synthesis of Literature on Workforce Agility

	Attributes	Authors/ Definitions
AO Mindset	Change-ready	Immediate reaction to changes and recovering from changes (Zhang and Sharifi, 2000)
		Positive attitude to the changes, new ideas, and technology (Sherehiy et al., 2007), Being comfortable with change, new ideas, and new technologies (Plonka, 1997)
	Business-driven	Being visionary, future-oriented, customer-focused , big picture-oriented, results-oriented, knowledgeable about the marketplace and the way the business operates (Dyer and Shafer, 1998: 17&18)
		Oriented to bottom line organisational performance: (e.g. Understanding the business, being solution-oriented, being (im)patient) (Shafer, 1997:6)
		Have strategic vision to scan the business world (Sharifi and Zhang, 1999)
		Oriented to the context in which the organisation operates (e.g. Being customer-focused, seeing the big picture, having a vision) (Shafer, 1997:6)
		Comprehend and embrace the importance and essence of marketplace agility, the challenges of dynamic environments and organisations’ strategies and approaches to thrive in such marketplaces, and articulate the essentiality of organisational agility capabilities (Dyer and Shafer, 2003).
	Values-driven	Instinctively living the organisation's core values. (Dyer and Shafer, 1998: 17&18)
	Accountability	Take responsibility for the actions taken and possible results (Dyer and Shafer, 1998: 17&18)
		Willing to accept joint responsibility for the company’s success, Accountability for meeting goals they have set (Goldman et al., 1995)
		Accepting new responsibilities (Plonka, 1997)
	Ownership	Willing to think like owners of the company, Ownership of the company’s problems such as their own problems (Goldman et al., 1995)
	Empowered	Expected to think about what they are doing, are authorized to display initiative and supported by management to be innovative
		Fully empowered workforce whose ideas and knowledge are fully utilised (Vernadat, 1999; Owusu, 1999; Bustamante, 1999; Meredith and Francis, 2000; Hormozi, 2001; Crocitto and Youssef, 2003; Ramesh and Devadasan, 2007)
Empowered (Gunasekaran,1999; Goldman et al., 1995)		
Motivated	(Kidd, 1994; Gunasekaran, 1999)	
	Being in tune with oneself and what makes one effective (e.g., knowing oneself, understanding others, trusting and being trusted)” (Shafer, 1997:6)	

AO Behaviours	Flexible	Deploying multiple tasks (Sharifi and Zhang, 1999 ; Gunasekaran, 1999; Goldman et al., 1995)
		Professional flexibility: Ability and competence of working on different tasks in different teams simultaneously (Sherehiy, 2008; Zardeini and Yousefi, 2012:50; Asari et al., 2014)
		Require assumption of multiple roles to perform in different capacities across levels, and projects even external organisational boundaries both serially and simultaneously (Dyer and Shafer, 2003) Note: They call it an adaptive behaviour
		Rapidly redeploy across the roles and move from one role to another very quickly (Dyer and Shafer, 1998:16 and 2003)
	Responsive	Intelligence: Responsiveness to changes in customer needs and market conditions, Ability to read and interpret external change (e.g. In customer needs, market conditions, emerging business opportunities and competitor strategies), Ability to adjust objectives accordingly and to act speedily in line with the resulting strategic direction” (Breu et al., 2002; Bosco, 2007)
		Capable of contributing to the bottom line of a company that is constantly reorganising its human and technological resources in response to unpredictably changing customer opportunities”. (Dove and Wills, 1996: 196)
		Deal with uncertainty and respond to unanticipated events, (Plonka, 1997)
		Dealing with uncertain and unpredictable work situations by taking effective action when necessary; readily and easily changing gears in response to unpredictable or unexpected events; effectively adjusting plans, goals, actions, or priorities to deal with changing situations (Pulakos et al., 2000: 617).
	Quick	Speed of developing new skills required for business process change Rapid decision-making and execution Speed of acquiring the skills necessary for business process change Speed of innovating management skills Speed of acquiring new IT and software skills (Breu et al., 2002).
		(Im)patient (i.e., simultaneously exhibit a strong sense of urgency and a willingness to let things take their course). (Dyer and shafer, 1998: 17&18)
	Collaborative	Capability for collaborating effectively across project, functional and organisational boundaries (Breu et al., 2002) and (Bosco, 2007)
		Multifunctional, Collaborating in multi-lingual and geographically distributed workplace (Gunasekaran, 1999)
		Cooperative: Able to work well on cross-functional intra-enterprise and inter-enterprise teams (Goldman et al., 1995; Kidd, 1994)
		Spontaneously collaborate to pool resources for quick results (Dyer and Shafer, 1998:16) and (Sherehiy et al., 2007)
		Workforce collaborates from geographically separated locations, and between different engineering disciplines (Forsythe, 1997)
	Innovative	About what they do and how they do it (Goldman et al., 1995)
		Innovate (moving beyond old solutions unless they truly fit); and learn (rapidly and continuously) (Dyer and Shafer, 1998:16)
		Having ability to generate innovative ideas (Plonka, 1997)
	Creative	Self- motivated creativity: motivation and the desire to adapt aggressively to the changing external conditions and innovations that tend to obsolesce the other attributes (Quinn et al., 1996)
		Creative problem solving (Plonka, 1997:16; Sherehiy, 2008:31; Asari et al., 2014; Pulakos et al., 2000)

	Proactive	Proactive initiative: active search for opportunities to contribute to organisational success and take lead in pursuing those that appear promising (Dyer and Shafer, 2003; Goldman et al., 1995)
		Proactive improvisation: requires devising and implementing new and creative approaches to pursuing opportunities and dealing with threats (Dyer and Shafer, 2003)
		Take initiative to spot threats and opportunities in the marketplace, reconfigure the organisational infrastructure to focus when and to where they are needed to deal with serious threats and opportunities, and learn (no waiting for permission or instructions to act) (Dyer and Shafer, 1998:16)
		Dealing with unpredictable and uncertain situations: easily adjust to and deal with the unpredictable nature of situations, efficiency and smoothly shift orientation or focus when necessary, and take reasonable action, in spite of inherent uncertainty and ambiguity in the situation (Pulakos et al. 2000:613; Sherehiy, 2008; Asari et al., 2014)
		Able to set priorities, and develop solutions(Dyer and Shafer, 1998: 17&18)
		Anticipation of problems related to change, Solution of change related problems, Personal initiative (Sherehiy et al., 2007; Pulakos et al. 2000)
	Adaptive	Comfortable with themselves, empathetic, comfortable with ambiguity, comfortable with paradox, and resilient (Dyer and Shafer, 1998: 17&18)
		Demonstrating interpersonal adaptability: Being flexible and open-minded when dealing with others (Pulakos et al., 2000:617)
		Demonstrating cultural adaptability: Taking action to learn about and understand the climate, orientation, needs, and values of other groups, organisations, or cultures (Pulakos et al., 2000: 617)
		Able to work in uncertain time and conditions (e.g., dealing with ambiguity, experimenting, learning on-the-fly) (Shafer, 1997:6)
		Coping with change and transferring knowledge and learning between tasks when assuming different roles. Adaptive behaviour has two components: <ul style="list-style-type: none"> • Cognitive component: application of learning and problems solving capabilities to assess information about change, predict problems associated with change and plan for coping strategies. • Emotional or non-cognitive component: emotional adjustment to changing roles and their different requirements. It requires employees to willingly allow change to occur without showing resistance, and to demonstrate positive emotional reactions to change and the possible opportunities that change can brings (Allworth and Hesketh, 1999).
	Resilient	Being resilient: Ability to perform effectively under the stress and despite changing environment or even though practiced strategies have not worked. Resilience requires workforce to have: <ul style="list-style-type: none"> • Positive attitude to the changes, new ideas, and technology; • Tolerance of uncertain and unexpected situations, differences in opinions and approaches • Tolerance to stressful situations (Sherehiy et al., 2007)
		Handling work stress : Remaining composed and cool when faced with difficult circumstances or a highly demanding workload or schedule (Pulakos et al., 2000: 617)
		Coping with work stress and handling stressful and hard situations at work (Ismail, Yao and Yunus, 2009; Sherehiy, 2008; Asari et al., 2014)
		Being resilient (Griffin and Hesketh, 2003) Change or modify themselves or their behaviours to fit new environment (Griffin and Hesketh, 2003)

Skills & Knowledge	Generative	Simultaneously learn in multiple competencies areas and educate by actively sharing of information and knowledge (Dyer and Shafer, 2003)	
		Learning work tasks and procedures (Sherehiy, 2008).	
		Open to continuous learning, Able to acquire new knowledge and skills on a “just-in-time” project-pulled basis, Open to cross-training (Goldman et al., 1995)	
		Attitudes towards learning and self-development (Plonka, 1997; Virchez Azuara, 2015)	
		Organisationally adept, open to experimentation, fast learners and applicers of new knowledge, and team players (Dyer and Shafer, 1998: 17&18)	
		Continuously learn (Plonka, 1997)	
		Demonstrating enthusiasm for learning new approaches and technologies and procedures; keep knowledge and skills current; anticipating changes in the work demands and searching for and participating in assignments or training that will prepare self for these changes; taking action to improve work performance deficiencies (Pulakos et al., 2000: 617)	
	Skilled	Highly skilled (Kidd, 1994; Gunasekaran, 1999)	
		Multi-skilled and multi-functional (Duguay et al., 1997; DeVor et al., 1997; Vokurka and Flidner, 1998; Owusu, 1999; Bustamante, 1999; Meredith and Francis, 2000; Zhang and Sharifi, 2000; Maskell, 2001; Hormozi, 2001; Yusuf et al., 2003)	
		Competent and empowered with necessary skills and capabilities to deal with turbulence in the market (Sharifi and Zhang, 1999)	
		IT-skilled workers (Abair, 1995; Forsythe, 1997; Gunasekaran, 1999)	
		Technologically literate, Able to utilise an open information environment effectively and with integrity (Goldman et al., 1995)	
		Competent in acquisition of skills, in particular IT and software skills, management and business process integration and their continuous alignment with an evolving business direction (Breu et al., 2001) and (Bosco, 2007); (Pourazari, 2016)	
		Manual dexterity and cognitive ability (Plonka, 1997)	
Knowledgeable	Knowledgeable (Sharifi and Zhang, 1999 ; Gunasekaran, 1999; Goldman et al., 1995)		
	“professional intellect” Quinn, et al (1996):	Cognitive knowledge or Know-what which is the basic mastery of a professional discipline	
		Advanced skills or know-how defined as the ability to apply the rules of a discipline to complex real-world problems	
		Systems understanding or Know-why which reflects deep knowledge of cause-and-effect relationships in complex organisations and the ability to anticipate subtle interactions and unintended consequences	
	Have knowledge in team working and negotiation and advanced manufacturing strategies and technologies (Abair, 1995; Forsythe, 1997; Gunasekaran, 1999).		
Comprehensive knowledge of process technology in order to make a greater contribution to the design and improvement of their work place (Plonka, 1997)			

2.8 SHRM and Organisational Agility

The previous sections portrayed a picture of the new conditions in the business and HR environment discussing the issues of increased uncertainties, dynamics and complexities. The significance of workforce agility and the agility of HRM have been also discussed. From this perspective, a review of SHRM literature is conducted to examine how the field have responded to the new conditions in the environment, and how SHRM theories have evolved in the light of emerging strategic management theories and approaches, specifically the agility strategy. The main aim of this section is to provide a review of this investigation in SHRM literature.

2.8.1 SHRM: Background and Evolution

While the purpose of this section is not to discuss the evolution of SHRM theories and frameworks, a discussion of how the field has responded to different environmental drivers would be difficult without a brief consideration of overall SHRM evolution.

HRM discipline has been in making for just over three decades (Kaufman, 2015b). A considerable body of knowledge is formed around the concept which, as a dimension of organisational function, has proven to have made a substantial contribution to the successful management of organisations (Jackson et al., 2014; Kaufman, 2015b). In particular, scholars of the field have turned their attention to strategic aspects of HRM and consequently strategic HRM has appeared as an important line of discussion and research among scholars (Fombrun et al., 1984; Lengnick-Hall et al., 2009; Kas̃e and Batistic̃, 2012; Cascio and Boudreau, 2012; and Paauwe et al., 2013).

Morris and Snell (2010) identified three evolutionary stages for HR strategy, starting from the industrial revolution in the early 1900s , where the focus was on organisational efficiency through person-job-fit, then the global competition and diversification of the 1970s and 1980s, where HR started to take a more systematic approach to HR practices and aligned them internally and with the firm's strategy, to the differentiated work systems and hyper-competition of today, where the key strategic drivers are innovation and change, so that firms

have started to consider how HR can be formative to a firm's strategy by moving the focus toward capabilities and knowledge management.

Although SHRM has evolved significantly during these periods, the definition and the key objectives of HR strategy remain the same (Morris and Snell, 2010; Kaufman, 2015b). As put by Boxall and Purcell (2000: 185), SHRM is "concerned with the strategic choices associated with the use of labour in firms and with explaining why some firms manage them more effectively than others". Snell et al. (2001) define the key objectives of HR strategy as: "to guide the process by which firms develop and deploy people, relationships, and capabilities to enhance their competitiveness" (Cited in Morris and Snell, 2010:84).

Similarly, Kaufman (2015b) contends that SHRM's basic conceptualisation has remained the same since its birth year is 1984. He identified the essential features as:

- "HRM as the people management part of firms and the importance of strategic HRM in assisting firms to more effectively use their human capital to build and sustain competitive advantage in an increasingly changing and competitive marketplace
- A holistic system's view of individual HRM structures and practices and the alignment of HRM system with business strategy and integration of practices within the system
- A strategic perspective on how the HRM system can best promote organisational objectives
- Emphasis on the long-run benefits of a human capital/high-commitment HRM system" (Kaufman, 2015b:396)

However, the two important aspects of HRM have changed over time which are: 1) the emergence of knowledge economy with the increasing value placed on human capital (Lengnick-Hall and Lengnick-Hall, 2002; Noe, 2010; Morris and Snell, 2010), and their knowledge and behaviours. 2) The people are no longer seen as commodities and cost, but as key sources of strategic capability (Morris and Snell, 2010). These two changes have significantly changed the focus of HR strategy and made human resources and HRM a potentially unique source of competitive advantages (Chadwick and Dabu, 2009).

Along with these two important changes and the three stages of HRM development, a range of

theoretical perspectives has been introduced. Space constraints make it impossible to review all of these theoretical influences here. However, the aim is to focus on the most influential works which inform this research conceptualisation of agility-oriented HR strategy, and also the theories which more capture the essence of market place turbulence and uncertainty and hyper- competition.

This review only identified a small number of studies which focussed explicitly on the HR strategy in agile organisations. In addition to these core studies of agility-oriented HR strategy, this section also selectively discusses three prevailing SHRM theories, as their underpinning assumptions can be incorporated into the research conceptualisation of AOHRS.

These theoretical views include: The Resource-Based View (RBV) of the firm; the AMO-behavioural framework; and human capital theory as they are considered as the most influential works (Kaufman, 2015b); and main pillars of the traditional HRM frameworks (Jackson, et al., 2014).

In addition, a brief review of the high-performance work practices (HPWPs) model is also made in this section as a number of scholars such as Angelis and Thompson (2007), Patel and Cardon (2010), and Rodwell and Teo (2008) argued that organisations dealing with intense market competition, increasing customer demands, and the complexity of products and services are more likely to implement high-performance HRM systems (Jackson et al., 2014).

2.8.1.1 RBV and SHRM

The resource-based view (RBV), pioneered by Barney (1991), has been the prevailing paradigm in strategic management since the 1980s (Lockett *et al.*, 2009), displaced the Porter's product market-positioning strategy model (1980), which was mainly based in industrial organisation economics (Barney and Clark, 2007). The key distinction from Porter's approach is that RBV encourages an internal focus to the firm (vs external markets) to gain more value out of an internal bundle of resources and capabilities, which are referred to as the RBV constructs (Rashidirad et al., 2015; Kaufman, 2015a).

This theory posits that firms can achieve competitive advantage by acquiring and developing

internal resources that are valuable, rare, inimitable and non-reproducible (VRIN) (Barney, 1991; Barney and Clark, 2007). Specifically, it is the heterogeneous nature and their immobility that have the potential to create value and competitive advantage (Barney, 1991).

The RBV subsequently incorporated into strategic HRM theories (Wright *et al.*, 1994; Boxall, 1996). SHRM scholars such as Barney and Wright (1998) and Wright *et al.* (2001) contend that RBV can provide foundation for survival and prosperity in the face of intense competitive market place, by applying the strategy of VRIN to human resources and their capabilities. As put by Kaufman (2015 a, 2015b), the main challenge is to shield human capital from a competitive erosion of value, such as when rivals attract the high-productivity employees or when the workers ask for an increase in their wages through threat of exit.

Coff and Kryscynski (2011) argued that the required competitive safeguard can be built by applying ‘immobilising devices’. This is in tune with the Barney and Clark (2007: 253) argument, suggesting that the main performance contribution of the RBV comes from adopting the RIN approach to promote employee immobilisation and differentiation, for instance through specific Learning and Development (L&D) programmes.

This implies that the human resources are not per se the basis of competitive advantage but the way organisations integrate and utilise their skills, knowledge, experience and capabilities (Wright and Snell, 2009). This stresses the importance of implementing VRIN through a HRM system. In the same vein, Becker and Huselid (1998: 55) argue that this is the system of HR practices that is inimitable and when designed to acquire, motivate and develop the human capital, can be a source of competitive advantage. However, as pointed out by scholars such as Lepak and Snell (2007) and Kaufman (2013), the main challenge is to find the appropriate type of HRM system which best fosters VRIN, considering that there are various types of HRM practices, which can be integrated to build different bundles for alternative applications (Kaufman, 2015b).

Among considerable criticisms of RBV that have been discussed by SHRM scholars, the most important issue from the perspective of this research is its internal orientation. Given the huge influence of the theory on the strategic HRM field- considered by Allen and Wright (2007: 90)

“as a guiding paradigm on which virtually all strategic HRM research is based” - it is not surprising that the relative attention in the contemporary SHRM literature has diverted to internal factors while missing the effect of external contingencies. Kaufman (2015a) reported that the SHRM literature is limited in providing insights about when and why organisations select different strategies and how this choice is influenced by external environmental contingencies and considered this issue as a paradoxical consequence of the RBV.

Rashidirad et al. (2015), in a similar way, argue that SHRM based on RBV are based on static assumptions about the business environment, which made the use of RBV in HR strategy development limited. They assert that dynamic capabilities theories can overcome this shortcoming by enhancing the level of dynamism in strategy development.

Bhattacharya and Wright (2005) criticised the RBV in a different way by arguing that the theory does not answer the question of how firms may develop resources. They proposed incorporating real options theory to HRM, as a complementary to the RBV, which explicitly discusses the matter of investment choices for future resources and capabilities. According to the authors, the options framework provides an economic rationale for incremental, path-dependent resource investments, and in particular provides insights about the process of resource allocation, which is absent in the RBV.

Similarly, it can be argued that an AOHRs framework based merely on the foundation of RBV would fail to consider the effects of external environmental contingencies. It will be discussed in the section 2.10 that how the previous models of AOHRs (by Shafer et al., 2001; Dyer and Shafer, 1999, 2003; Dyer and Ericksen, 2006) are based on rather static assumptions about the competitive environment and are limited in the consideration of dynamics and complexity of the necessary organisational capabilities and desired people competencies.

2.8.1.2 Human Capital Theory

Rooted in a resource-based view, the human capital theory discusses that an organisation’s human resources, also known as human assets, are a valuable strategic asset for the firm (Wright et al., 1994; Snell et al., 1996; Becker and Huselid, 1998), which has the largest potential for becoming a source of competitive advantage. Human capital is defined as “the

collection of knowledge, skills, and abilities of employees in an organisation” (Kaufman 2015b:400). The concept became popular in line with the emergence of knowledge-driven economies where continuous learning and innovation are key success factors (Becker and Huselid, 1998).

In line with human capital theory, the concept of talent management acquired significance by assisting the firms in enhancing their human capital through attracting the most highly skilled talent, developing a differentiated workforce and enhancing their firm-specific knowledge and retaining them with the application of appropriate rewarding practices (Flamholtz and Lacey, 1981; Morris and Snell, 2010; Jackson et al., 2014).

Bhattacharya and Wright (2005) identified a gap in the literature by arguing that the existing theory commonly addressed only the rising value inherent in human capital as an asset, while human capital, similar to other assets, embodies some uncertainties that need to be managed. They identified four types of uncertainties regarding the value of human capital which they listed as uncertainties of return including: skill obsolescence and the risk of unsuitability and inadequacy of employees’ skills; demand for future skills; human capital loss; and loss of productivity. Table 2.10 in section 2.8.5.2 provides further details about uncertainties of human capital. They proposed a HR ‘options’ model for identifying various forms of uncertainties of human assets and managing them through a system of HR practices. For further details and explanation please see section 2.8.5.2.

When agility is the strategic management approach of an organisation, human capital theory can imply that one of the main strategic roles of HR is to effectively build, develop and utilise its human capital to facilitate the quick implementation of transient strategies, and to contribute to the development of organisational agility capabilities. Moreover, following the perspective of Bhattacharya and Wright (2005) about uncertainties of human assets, another significant role of HR would be identifying various forms of uncertainties of human assets and managing them through a system of HR practices, which together with previous point inform the research question three.

2.8.1.3 Behavioural Perspective and The Ability, Motivation, Opportunity (AMO) Theory

Behavioural perspective complements the RBV and human capital theories, by arguing while human capital-i.e. employee knowledge and skills, is necessary, without the exhibition of appropriate role behaviours from employees, the organisational objectives cannot be achieved (Jackson, 2013). The perspective argues that various strategies demand different role behaviours from employees in order to be implemented successfully. Thus, HRM systems can contribute to the effectiveness of a firm when managing employee behaviours and promoting the desirable behaviours (Schuler and Jackson, 1987a).

These behaviours comprise two groups: explicit behaviours which are identified in job descriptions, and discretionary behaviours such as organisational citizenship (Coff and Kryscynski, 2011; Snape and Redman, 2010). Jackson et al. (2014) argued that an important feature of the behavioural perspective is the acknowledgment of contingency factors such as the characteristics of the external and internal environments, in influencing the desirability and utility of employee behaviours.

The ability, motivation, opportunity (AMO) model, as a version of the behavioural perspective, stemmed from research on career development, which contended that career success requires three factors: the necessary abilities and motivation to succeed, and access to learning opportunities (Blumberg and Pringle, 1982; Gutteridge, 1983).

Mirroring the perspective advocated by the behavioural perspective, the existing models of AOHRs (e.g. Dyer and Shafer, 1998, 2003; Shafer et al., 2001; Dyer and Ericksen, 2006), as described in section 2.8.3, consider the ‘attributes of agile people’- desired employee mindset and behaviours- as key defining factors in crafting an AOHRs. Similarly, the behavioural perspective can be adopted in the development of this research’s AOHRs framework by arguing that agility strategy demands a specific set of employee behaviours.

2.8.1.4 High-Performance Work Practices (HPWPs)

The high-performance work practices (HPWPs) models incorporate RBV, AMO, behavioural, and human capital perspectives in search for HR systems and the “bundles” of HR practices

that contribute to organisational performance. This stream of research assumes that it is the complexity of the HRM practices configuration and their internal and external alignments that make HR a source of competitive advantage (Morris and Snell, 2010).

Arthur's article (1994) marked as the start of a stream of research on high performance work systems (HPWS) by identifying that commitment HR systems (vs. control systems) lead to higher productivity, lower scrap rates, and reduced turnover (Lengnick-Hall et al., 2009). Huselid (1995) similarly reported that high performance work systems (HPWSs) positively impact on the financial performance of the firms. He defined HPWSs as "those including comprehensive employee recruitment and selection procedures, incentive compensation and performance management systems, and extensive employee involvement and training." (Lengnick-Hall et al., 2009:72)

A common theme in the SHRM literature is that an appropriate response to the dynamic market conditions with intensifying complexity and competition, is an effective use of human capital by implementing high-performance work practices (HPWPs) (Kaufman 2015a). For instance, scholars such as Angelis and Thompson (2007), Patel and Cardon (2010), and Rodwell and Teo (2008) argued that organisations dealing with intense market competition, increasing customer demands, and the complexity of products and services are more likely to implement high-performance HRM systems (Jackson et al., 2014).

Kaufman (2015 a), however, criticised this assumption by using an alternative economics-based model which identified significant flaws and weaknesses in the proposition of "the more competition → more HPWPs → higher firm performance" proposition. Instead, he concludes "more competition leads to less HPWPs".

Although adoption of high-performance work practices (HPWPs) is considered as an appropriate response to the intensified complexity and competition in the market, no empirical supports have been found for the positive impact of HPWPs on organisational agility.

2.8.1.5 Competing Frameworks: Universalistic, Contingency, and Configurational Perspectives

A taxonomy approach, proposed by Delery and Doty (1996), categorises the theoretical perspectives of SHRM research into three modes: universalistic, contingency, and configurational perspectives. The main difference between these three competing perspectives is in the ways and conditions under which HRM practices contribute to firm performance (Morris and Snell, 2010).

The universalist perspective argues that there is a set of HR practices, referred to as ‘best practices’, which positively affect organisational performance regardless of context and despite differences in strategy, industry, technology, and the like (e.g., Pfeffer, 1998). Thus, there is no need for fitting HR practices to a particular strategy or an organisational context and contingencies (Morris and Snell, 2010; Lengnick-Hall et al., 2009).

The contingency perspective, in contrast, argues that the impact of HR practices on organisational performance depends on their alignment, fit or congruence with organisations’ external and internal contingencies such as industry, business strategy, technology, organisational structure and size, and life cycle or developmental stages (Baird and Meshoulam, 1988; Lengnick-Hall and Lengnick-Hall, 1988; Jackson et al., 1989; Jackson and Schuler, 1995; Wright and Snell, 1998).

Baird and Meshoulam (1988) expanded the notion of fit by introducing two types of fit in selecting HR practices: External fit, also known as vertical fit, is concerned with aligning HR practices with the firm’s strategy (Boxall, 1996; Delery and Doty, 1996); and internal (horizontal) fit, which is concerned with how HR practices are aligned with one another and mutually reinforcing each other. The authors also proposed that the strategy-HR practices fit will change as an organisation advances through its life cycle stages.

The advocates of contingency perspectives contend that HR practices can promote the required employee behaviours for given organisational contingencies (Schuler and Jackson, 1987a, 1987b). While, SHRM scholars have typically tended to use generic strategy typologies, they have tried to match these different types of strategies with specific sets of HR practices which provide the desired behavioural outcomes for each strategy.

For instance, Miles and Snow's (1984) strategy typologies of defenders, prospectors, analysers, and reactors, have been matched to specific sets of HR practices. The same was proposed for Porter's (1980) strategy model, when Arthur (1990) argued for matching a 'control/cost reduction' HRM system with cost leadership, and a 'commitment' HRM system with differentiation strategy (Colakoglu et al., 2010). Despite the critics of these typologies, the important positive impact of them for the SHRM field is their emphasis on the importance of aligning the internal aspects of firms including HRM system, employee skills and behaviours with the external environment (Morris and Snell, 2010).

Wright and Snell (1998) extended the insight of the notions of fit and flexibility in HRM by arguing that strategy fit includes alignment with three aspects of HRM: HRM practices, employee skills, and employee behaviours. They considered fit and flexibility as complementary concepts (as opposed to orthogonal suggested by Lengnick-Hall and Lengnick-Hall (1988)) and argued that firms should promote both fit and flexibility.

The configurational approach (Delery and Doty, 1996), differs from best-practices and traditional contingency theories by following the three criteria of (1) being directed by the holistic principle of inquiry, (2) being based on typologies of ideal types, and (3) adopting the assumption of equifinality" (i.e., numerous exclusive configurations of elements can result in maximum performance) (Delery and Doty, 1996; Lengnick-Hall et al., 2011).

Consistent with RBV thinking, the configurational perspective argues that this is the unique pattern of HR practices that influence organisational performance (Lengnick-Hall et al., 2009), implying the importance of attaining a positive bundle of HR practices and the significance of horizontal alignment among them. Particularly, it is stressed that it is the "coherent and horizontally aligned HRM practices that create positive synergistic effects on organisational outcomes" (Kepes and Delery, 2007: 385). In addition, equifinality implies that various configurations of HR practices may be effective in any given situation. Thus, the advocates of configurational perspective believe that various HRM systems can lead to equal results (Delery and Doty, 1996; Lepak and Snell, 2007).

While there has been numerous debate between these distinct modes of theorising, especially between the contingency (best fit) and the universalistic (best practices) perspectives, some researchers such as Youndt et al. (1996) and Boxall and Purcell (2008) asserted that best fit and best practices perspectives are not necessarily mutually exclusive. Similarly, a review by Colakoglu et al. (2010) identified empirical support for all three perspectives.

Getting back to the research aims and its objective to develop a theoretical framework for Agility-Oriented Human Resource Strategy, an important aspect of this theory development is selecting the best perspectives from these three distinct modes of theorising. For instance, Lengnick-Hall et al. (2011) adopt a configurational approach to SHRM in their framework of SHRM for organisational resilience.

From the strategic agility perspective, the adoption of the contingency perspective can argue for a particular HRM system and a specific sets of HR practices that matches with the requirement of agility strategy.

Similarly, the adoption of a configurational approach can result in an Agility-Oriented SHRM framework, aiming to develop an AOHR system that achieves both a horizontal and vertical fit. To achieves a horizontal fit, the AOHR system needs to adopt internally consistent bundles of HR practices that lead to the creation of desired agility capabilities, and also align the components of the HR system with alternative strategic configurations to achieve a vertical fit. Moreover, to incorporate the assumption of equifinality, the research needs to find evidence of multiple combinations of HR practices that can potentially be bundled to create agility capabilities.

2.8.2 SHRM and The Changing Business Environment

This research reviewed SHRM literature to see how the previous theories and research provide insights for HRM in organisations performing in uncertain and turbulent business environments, and to understand how people management principles and practices should adapt when intense competition, uncertainty and turbulence is the case. The examination of SHRM literature in the light of emerging theories and approaches to managing organisations under changing and uncertain business environment, has identified that despite a number of

strong contributions to strategic aspects of HRM presented through various theoretical lenses, there is a range of gaps that still exist in addressing the quest of uncertainty and dynamism.

Similarly, the recent reviews of the field literature by Jackson et al. (2014) and Kaufman (2015a) have pointed to the need for further and continuous attention to the subject and updating it with the advances in other areas. Jackson et al. (2014), in particular, emphasise the criticality of attention to influences from the business environment and specifically the increased uncertainties, dynamics and complexities being experienced, and reported that the empirical SHRM research, despite embracing advanced views and theoretical directions (e.g. complex system theory by Mayrhofer (2004) and Colbert (2004)) in developing SHRM conceptual models, has ignored the environmental influences. The authors contend that strategic HRM is inherently contextualized, and that HRM systems should evolve according to the interdependencies they have with the external environment.

Moreover, although a fit and contingency approach to SHRM has been well explored in the pertinent literature (see Wright and Snell, 1991 and 1998; Schuler, 1986; Schuler and Jackson, 1987; Miles and Snow, 1984; Jackson et al., 2014), it has been observed that such views are yet to address some of the profound transformations and changes that have emerged in the past 20 years across markets and societies, contributing to some major shifts in views, approaches and theories.

It has been identified that while HRM researchers have been emphasising the importance of increased competition and other external forces as HRM determinants, the issues of intensified market competition and uncertainty, and how HRM should deal with them, have received little formal research attention (reviewed in Patel and Cardon, 2010). Furthermore, although HRM studies repeatedly consider increased competition as a main driver for transforming the HRM system, the field has been challenged with identifying the type of HRM system which best promotes responsiveness and agility. It has been also struggled with determining the ways in which HR strategy and its components can create capabilities to perform in such a marketplace and business environment.

Given the limited SHRM literature with a particular focus on organisational agility, the research reviewed HR studies that investigate the HR contribution to the development of relevant emerging organisational capabilities such as flexibility, innovation, and dynamic capabilities. The main aim was to understand how HR strategies and systems can enable organisations to develop the employee skills, knowledge, mindsets and behaviours in line with the desired organisational capabilities and competencies. Examples of these studies are provided in Appendix A3.

This attempt identified that appropriately designed HRM systems can facilitate the acquisition and development of the firm's human capital into desired organisational capabilities and competencies, the insight of which can be used in the development of the SHRM model for organisational agility.

2.8.3 SHRM and Organisational Agility: Extant Conceptualisations and Frameworks for AOHRM Strategy and System

Despite extensive emphasis on the critical role of people and agile HR in achieving agility (Kidd, 1995; Goldman et al., 1995; Plonka, 1997; Forsythe, 1997; Breu et al., 2002; Crocitto and Youssef, 2003; Vázquez-Bustelo et al., 2007; Sherehiy, 2008), agility studies have not paid enough attention to the HR aspects of organisations, and the scholars of SHRM have not responded to agility agenda. Thus, this review only identified a small number of studies which focussed primarily on the human resource strategy and explicitly explored pivotal HR contributions to the achievement of organisational agility.

Beatty (2005) contends that the development of an agile workforce management leads to a sustainable improvement in productivity and profitability and finally the achievement of competitive advantages. He reports that his participants believe that an agile workforce management will help them to adapt to changing market and global conditions by bringing more innovation into products and services. They also believe that an agile HRM will strengthen their strategic capabilities by attracting, developing and retaining employees with the right skills and deploying their competencies on various projects regardless of location.

It is believed that an agile application of human resources-including fixed, contingent basis, permanent and contract workers- to projects, decreases structural workforce costs. Insight from Beatty's (2005) findings also suggest that an agile HRM with a more data-driven and flexible approach to people management will not only have a significant effect on productivity, savings, growth and competitive advantage, but also have a compelling effect on long-term success and the survival of the company.

The key findings from his research on the best HRM practice for workforce agility indicated that only 16% of the participants considered their companies as being agile enough to utilise a workforce based on their strategic needs. Over 50% of his US participants believe that they are not proficient in attracting, developing and retaining their top talent and strategic employees. A lack of integration between business and HR strategies is indicated as a main barrier to workforce agility.

Shafer's study (1997) was the first to put an explicit emphasis on human resource dimension. His study assumes that HR activities shape '*agile people attributes*' and these attributes in combination with other levers create agility (Shafer, 1997:3). Follow up research on people in agile organisations (e.g. Dyer and Shafer, 1998, 2003; Shafer et al., 2001; Dyer and Ericksen, 2006) attempted to develop models for crafting a HR strategy that supports organisational agility.

Their proposed HRS model considered '*agile people attributes*' as key defining factors in crafting a HR strategy (shown in Figure 2.5). Dyer and Shafer (2003) in their conceptualisation of the HR strategy, focused on specifying a set of principles which direct the selection of appropriate policies, programs, and practices which are sufficiently synergistic and together they promote the required employee mindset and behaviours. They proposed a set of six principles that appear to be necessary and sufficient to accommodate the paradoxical and controversial nature of agile organisations (Dyer and Shafer, 2003).

As shown in Figure 2.5, the process begins with delineating the critical traits of agile organisations, then working back through employees' behaviours and competencies to identify

relevant agile attributes and finally specifies appropriate bundles of HR principles and practices to create those attributes (Dyer and Shafer, 2003).

Subsequently, Dyer and Ericksen (2006) while following a similar process in designing the HR system, proposed a different conceptualisation of workforce attributes. They introduced the concept of ‘workforce scalability’, as the necessary workforce attributes in dynamic situations and suggested a number of principles to direct the design of an HR strategy that enhances the two aspects of workforce scalability which are workforce alignment and fluidity (see section 2.8.5.2)

They adopted a contingency perspective, and similar to the previous studies by Dyer and Shafer, their conceptual process started with delineating the organisational competencies required for marketplace agility and analysing the context to identify essential workforce attributes, and, then, designing an HR system to develop those attributes.



Figure 2.5- Model of HR strategy in agile organisations proposed by Dyer and Shafer, adopted from several publications by Dyer and Shafer (Dyer and Shafer, 1998, 2003; Shafer et al., 2001; Dyer and Ericksen, 2006)

Similarly, Lengnick-Hall et al. (2011) believe a strategic HR system can directly impact an organisation's capacity for resilience by developing 'employee capabilities' in three different aspects of resilience (cognitive, behavioural, and contextual). They developed a model for HR systems which aimed at developing resilient employees who collectively create resilient organisations. Based on their model, desired employee capabilities along with HR principles

specify a bundle of HR policies that are horizontally consistent and are focused at fostering cognitive, behavioural, and contextual elements of resilience (See Figure 2.6).

They proposed that strategic human resources within a strong HR system are required to develop individual competencies among core workforce, that when amassed at the organisational level, can develop capacity for organisational resilience. Following the views of (Arthur and Boyles, 2007; Becker and Gerhart, 1996; Lepak et al., 2004; Schuler, 1992), They considered the HR system as a multilevel construct consisting of HR principles, HR policies and HR practices. Their HR system model, which is adapted from Lepak et al. (2004), comprises three elements: HR principles, HR policies, and desired employee contributions. (See Figure 2.6)

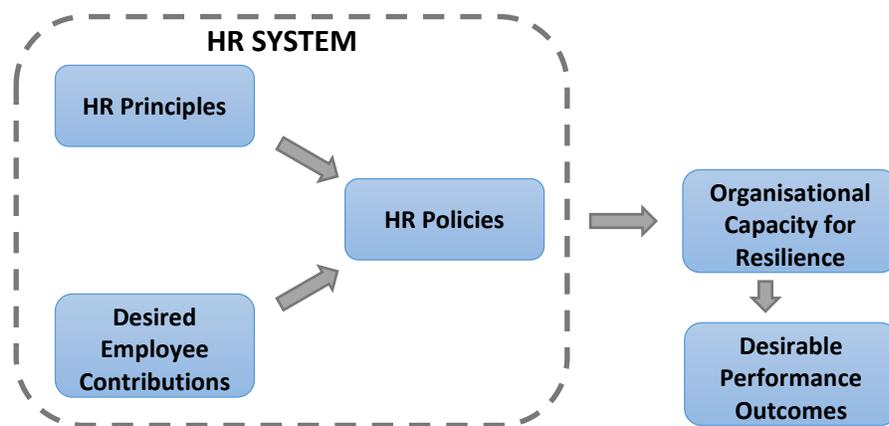


Figure 2.6 -Strategic human resource management system in developing a capacity for organisational resilience. Source: (Lengnick-Hall et al., 2011:248)

In their model, organisational capacity for resilience is directly associated to the firm’s HR system, in which, HR principles serve as guidelines to coordinate lower, less abstract policies and practices, while HR policies reflect alternative means of accomplishing the guiding HR principles as well as achieving the objectives to be attained by employees. Thus, they start with identifying the desired employee contributions associated with resilience, followed by determining HR principles, and then the appropriate HR policy configurations (see Table 2.6 in section 2.8.4.1).

They argued that an HR system develops messages and sends them to employees to communicate the expectations from them such as objectives and behavioural expectations. Consequently, consistent with the view of Haggerty and Wright (2010: 110), they described the characteristics of a strong HR system as one that “signals expectations that are correctly interpreted and acted upon by employees.” (Lengnick-Hall et al., 2011:248).

It is important to note that in their model the desired employee contributions are focused on the creation of component capabilities that reinforce resilience and interaction patterns rather than focusing on a set of specific strategic objectives. They believe in that way, a firm instead of only surviving and returning to a previous equilibrium state, would be able to exploit shocks and jolts. Later, in Chapters 6, 7, and 8, this research discusses how performing in the age of transient advantages requires both focuses.

In addition to these two groups of study, Beatty (2005) also conducted a research to identify best practices in HRM to develop workforce agility. Although, his research resulted in valuable insights about AOHR principles and practices, it does not provide a definite framework for AOHR strategy formulation. Thus, the above mentioned groups of study are the only agility and resilience-focused HR strategy models which have primarily focused on the desired employee contributions and in particular the employee mindset and behaviours required to achieve agility and resilience.

While there is commonality in the processes of designing the HR system for agility and resilience (see Figure 2.7), proposed by the two groups of authors, the identified people attributes (or employee contributions) and the associated HR principles differ across these studies; these will be discussed in the next sections.

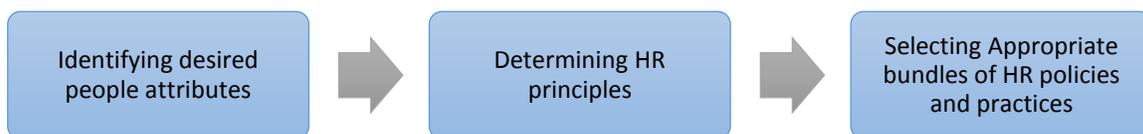


Figure 2.7: The Process of Designing HR System

Moreover, although the discussed groups of studies contribute substantially in defining the components of an AOHR strategy and system, they did not provide any definitions for AOHRM.

2.8.4 Agility-Oriented HRM System: Principles and Practices

2.8.4.1 Agility-Oriented HRM Principles

This section provides a brief summary of existing insights into the key principles of an AOHRM extracted from the extant studies to provide the basis for the subsequent discussion of AOHR practices. As mentioned before, the majority of agility studies only superficially dealt with HR aspects of the organisations. However, this section attempts to synthesise the important factors they suggested for management of the workforce in agile environments.

For instance, Gunasekaran and Yusuf (2002:1378), only presented a list of human factors that should be considered in agile environment comprising: “knowledge workers, multilingual workforce, multinational workforce, incentive schemes, type and level of education and training, relation with unions, and pay award.”

Similarly, Goldman et al. (1995) while they indicated creating a set of new responsibilities for managers in relation to development of an agile workforce, they did not explicitly determine any specific insight for HRM strategy and system. They assert that ‘management’ should ensure that employees have continuing access to information and knowledge resources, and to production, information and communication technologies. They highlighted the importance of following people-related principles:

- “Maintaining a company of the right size for the markets and product lines in which it competes
- Creating a knowledge sharing and an open information environment
- Balancing between workforce motivation and their job security concerns with the demands of constantly changing customer opportunities
- Integrating continuous learning into workplace activities and job performance expectations

- Supporting continuous education and training as an investment in the company's future prosperity
- Conducting ongoing core competency inventories and to invest in the new skills, knowledge, and technologies
- Encouraging and facilitating an extensive workforce communication
- Pursuing high standards of work life quality and to use appropriate reward mechanisms as an expression of support for high levels of commitment, dedication, and effort expected of a “think-like-an-owner workforce” and as a means of nurturing empowerment and trust” (Goldman et al., 1995:108)

Beatty (2005) introduced a new approach to HRM named as *Workforce Portfolio Management*. The workforce portfolio management suggests viewing the workforce as an asset which should be optimised, similar to the optimisation of other tangible assets such as money, real estate and intellectual property, mirroring the perspective advocated by human capital theory (Snell et al., 1996; Becker and Huselid, 1998). He further explained that a HRM with the portfolio management approach cannot be successful in optimising the workforce as a critical asset unless *alignment*, *accountability* and *agility*- as three imperative elements of the portfolio management approach- get integrated and reinforce each other.

Alignment between business and workforce strategies will happen when all HR practices support business strategies and all workforce activities and their skills and capabilities are aligned to achieve common business goals. In order to ensure that workforce performance and activities are planned based on the overall business strategy, someone needs to measure the productivity and business impact of the workforce, identify the areas of improvement and be accountable for workforce results. The existence of an effective performance management system is crucial in establishing greater accountability (Beatty, 2005). Workforce agility cannot be achieved when employees are restricted by the organisational structure. Agility demands a corporate environment where skills have more value than jobs, where decision making is driven by business intelligence, and where employees with the right skills move between the right projects.

Accordingly, he identified the following key principles for an ‘agile workforce management’ as:

- “Managing the workforce as a portfolio which requires
 - Maintaining a workforce that is agile enough to adapt to new opportunities, and a company that is agile enough to allow those employees to adapt to new opportunities;
 - Developing a corporate structure in which workforce strategy matches and fulfils corporate strategy;
 - Applying workforce resources across the enterprise
 - Making sure the right people are assigned to the right projects, regardless of title, compensation or reporting structure;
 - Recognising that the workforce must be sustainable for tomorrow, next year and even the next decade rather than building up reserves”
- Thinking in terms of the three A’s: alignment, accountability and agility:
 - Tie the workforce to business outcomes
 - Focus on talent diversity and succession planning
 - Ensure workforce agility
 - Ensure a workforce-accepted value proposition or brand
- Using business intelligence as a decision support tool.
- Thinking in terms of the workforce life cycle.
- Filling positions as roles, not jobs.
- Focusing on learning, throughout the life cycle.
- Depending on outsourcers for focus and economies of scale.” (Beatty, 2005:9)

The HR principles for an AOHRM identified from the core studies of HR agility are presented in Table 2.6.

Table 2.6: HR principles for an AOHRM Identified from the Core Studies on the Subject

Sources	HR principles for an AOHRM
Shafer et al. (2001)	<ul style="list-style-type: none"> - Achieving contextual clarity - Embedding core values - Enriching work - Promoting personal growth - Providing commensurate returns.
Dyer and Shafer (2003)	<ul style="list-style-type: none"> - Drive (Common purpose) - Discipline (Contextual clarity) - Autonomy (Fluid assignments) - Accountability (Ownership of outcomes) - Growth (Continuous development) - Continuity (Continuous employment)
Dyer and Ericksen (2006)	<p>Pursuing Workforce Alignment</p> <ul style="list-style-type: none"> - From the Top Down: Plan, and from the Bottom Up: Instil a Shared Mindset. <p>Pursuing Workforce Fluidity</p> <p><i>External Staffing: Guiding Principles</i></p> <ul style="list-style-type: none"> - Acquiring Talent: Pre-qualify Sources and Individuals - Releasing Employees: Routinize Outplacement <p><i>Internal Transitions: Guiding Principles</i></p> <ul style="list-style-type: none"> - Enrich the Talent Pool - Facilitate Interpersonal Connectivity - Expand Role Orientations - Align Incentives
Lengnick-Hall et al. (2011)	<ul style="list-style-type: none"> - Develop a partnership orientation with employees. - Localize decision making power. - Create fluid team-based work and job design. - Build relational rather than transactional relationships with employees. - Minimize rules and procedures. - Hire to ensure a range of different experiences, perspectives, paradigms, and competencies are available in the workforce. - Place a high value on pluralism and individual differences. - Invest in human capital. - Use both formal and informal social integration mechanisms. - Develop a culture of organisational ambidexterity. - Create a climate of open communication and collaboration. - Encourage problem solving processes tied to organisational learning. - Encourage knowledge sharing. - Enable rapid deployment of human resources. - Emphasize worker flexibility. - Encourage individual hardiness. - Encourage reflective practices - Eliminate organisational borders. - Encourage social interactions both inside and outside the organisation. - Nurture a climate of reciprocal trust and interdependence. - Develop facilitative communication structures - Develop self-management and self-leadership capabilities. - Emphasize contributions and outcomes rather than tasks. - Encourage an organisational orientation. - Reinforce organisational citizenship, personal accountability, and power based on expertise rather than hierarchical position. - Create broad resource networks.

2.8.4.2 Agility–Oriented HR Practices

In the context of the growing interest of organisations in increasing their agility, practices which focus on operational improvements have become popular for organisations to deploy and build agility capabilities. In contrast, practices associated with organisation and people, although theoretically have been considered as important in agility development (e.g. Sharifi and Zhang, 1999, 2001; Forsythe, 1997; Gunasekaran, 1998; Yusuf et al. 1999), are found to be less known and widespread among organisations pursuing agility (Glenn, 2009).

Only a small number of studies have focussed primarily on the human resource strategy and have explicitly explored HR practices pivotal to the achievement of organisational agility. As part of our review, we identified the HR practices that have been regarded as appropriate for dynamic organisations, or theoretically or empirically have been proposed as supportive for organisational agility. These include ten areas of HR activities consisting of work design, staffing, talent management, training and development, performance management, employee communication, employee engagement, empowerment, reward and recognition, and employee/labour relations. These ten categories are summarised and introduced in Table 2.7 and eight of them, which are discussed in more detail in previous works, are briefly explained in the following sections.

Table 2.7: Agility-Oriented HR Practices Identified from the Literature

HR Domains	Agility Enabler HR Practices	References
Work Design	Project teams (project-oriented organisational model), Team working, self-directed teams, cross-functional teams	Dyer and Shafer (2003); Shafer et al. (2001); Sharp et al. (1999), Sharifi and Zhang (1999, 2001), Zhang and Sharifi (2000), Gehani (1995), Gunasekaran (1999, 1998), Gunasekaran and Yusuf (2002), Yusuf et al. (1999), Sahin (2000), Jin-Hai et al. (2003), Meredith and Francis (2000), Goldman and Nagel (1993) ; Fliedner and Vokurka (1997); Lengnick-Hall et al. (2011); Lei et al. (2011)
	Fluid Assignments	Bridges (1994); Shafer (1997); Dyer and Shafer (1998 and 1999); Dyer and Shafer (2003); Shafer et al. (2001); Lengnick-Hall et al. (2011)
	Flexible job profiles and work assignments, blended work assignments, cross-trained teams, broad job description	Dyer and Shafer (1998); Lengnick-Hall et al. (2011)
	Flexible working policies such as flexitime, job sharing and telecommuting	Dyer and Shafer (1998)
	Discretionary-based work design	Dyer and Shafer (2003); Shafer et al. (2001);
	Job rotation, multifunctional workforce, job enrichment (responsibility on multiple tasks), broadening job scope	Gehani (1995), Gunasekaran (1999), Forsythe (1997), Sahin (2000) and Jin-Hai et al. (2003); Peterson, et al., (2003); Sumukadas and Sawhney (2004)
	Higher job control/autonomy	Sherehiy et al. (2008); Sherehiy and Karwowski (2014)
	Multidisciplinary team working environment	Medhat and Rook (1997), Gunasekaran (1998), Gunasekaran and Yusuf (2002) and Vernadat (1999)
	Organise work around core competencies and skills	Goldman et al. (1995); Beatty (2005)
	Eliminating non-core activities through outsourcing or off-shoring	Goldman et al. (1995); Beatty (2005)
	Virtual teams	Breu et al. (2002)
Staffing	Continuous employment: invest in human capital	Dyer and Shafer (2003); Shafer et al. (2001);
	Careful selection based on value congruence, selection based on workforce agility attributes	Dyer and Shafer (1998 and 2003); Shafer et al. (2001); Plonka (1997); Lengnick-Hall et al. (2011)
	Strategic use of contingent workforce	Shafer (1997); Dyer and Shafer (1998); Beatty (2005)
	Broad recruiting sources	Lengnick-Hall et al. (2011)
	Intensive orientation programs	Dyer and Shafer (2003); Shafer et al. (2001);
	Closed internal staffing	Dyer and Shafer (1998)
	Weeding of non-performers	Dyer and Shafer (1998)
	HR planning needs to be aligned with business planning and both be adaptable while maintaining a stable core and sense of direction.	Nijssen and Paauwe (2012)
	Access to centralised workforce data	Shafer (1997); Beatty (2005)

Talent Management	Open market for talent	Dyer and Shafer (2003);
	Retain core employees	Shafer (1997); Dyer and Shafer (1998)
	Retain strategic talents Develop explicit 'competency growth models' for them Differentiating pay, development, assignments and retention for them	Beatty (2005)
	Minimise voluntary turnover: Offering: - freedom, flexibility, excitement, and opportunities - competitive pay packages Minimize layoffs or otherwise the effects of layoffs: deploy Equitable severance and outplacement programs	Dyer and Shafer (2003)
	Career progression Internal hiring, information about emerging opportunities shared internally	Dyer and Shafer (1998)
	Mobility programme: provide opportunities for competency development	Dyer and Shafer (1998)
	Agile workforce supply management - Quality of supplier relationships - Postponement -Allowing organisational slack	Dyer and Ericksen (2006); Nijssen and Paauwe (2012)
	Developing a unified employer brand	Beatty (2005)
	Invest in human capital	Lengnick-Hall et al. (2011)
Training and Development	Continuous training and development, Higher average skill levels, Workforce skill upgrade, Cross-functional training	Dyer and Shafer (1998, 2003); Shafer et al. (2001); Zhang and Sharifi (2000), Gunasekaran(1999), Gunasekaran and Yusuf (2002), Yusuf et al. (1999), Sahin (2000), Jin-Hai et al. (2003), Goldman and Nagel (1993), Fliedner and Vokurka (1997), Hormozi (2001), Meade and Sarkis (1999), Maskell (2001); Yao and Carlson (2003); Gehani (1995); Nagel and Dove (1992); Goldman et al. (1995); Lengnick-Hall et al. (2011); Dyer and Ericksen (2008,2010)
	Heavy investment in education, training and development	Shafer (1997); Dyer and Shafer (1998); Bahrami et al. (2016)
	Emphasise on-line training; create environment and encourage to learn more; bring about rotation based job allotment	Duguay et al. (1997); Bustamante (1999); Vernadat (1999); Assen (2000); Maskell (2001); Hormozi (2001)
	Development programmes includes all categories of employees	Goldman et al. (1995); Dyer and Shafer (1998)
	Development opportunities expanded beyond organisational boundaries to cover employees of suppliers, customers, and partners in virtual organisations.	Dyer and Shafer (1998)
	Responsibility for development rests with individual	Shafer (1997); Dyer and Shafer (1998)

	Focus on shared value, common performance metric, managing change, marketplace, competitive strategies, financial matters	Shafer (1997); Dyer and Shafer (1998)
	Training about next generation equipment designs and technology	Plonka (1997)
	Facilitate Serial Incompetence: zero tolerance for complacency or slow learning	Dyer and Shafer (2003); Shafer et al. (2001); Dyer and Ericksen (2008,2010)
	On-the-fly assessments of learning gaps	Dyer and Shafer (2003); Shafer et al. (2001);
	Zero tolerance of competency obsolescence	Dyer and Shafer (2003); Shafer et al. (2001);
	Communities of practice to nurture collective intelligence	Dove (2001); Cohen and Prusak (2001); Dyer and Shafer (2003); Shafer et al. (2001);
	Training on the fly: learning that takes place on assignment and on the spot, often through web-based or other types of self-study programs, often done on employees' own time Just-in-time training: individualised on-line instruction Action learning	Dyer and Shafer (2003); Shafer et al. (2001); Dyer and Shafer (1998, 1999); Plonka (1997); Sharp et al. (1999); Harvey et al. (1999); Sumukadas and Sawhney (2004)
	Cascading gap analysis	Dyer and Shafer (2003); Shafer et al. (2001)
	Survival tactics workshops	Dyer and Shafer (2003); Shafer et al. (2001)
	Team-to-team learning	Gunasekaran and Yusuf (2002)
	Core-competence management	Sharp et al. (1999)
	Knowledge acquisition from internal and external sources	Jin-Hai et al. (2003) and Maskell (2001)
	Cross-training and Job rotation	Gunasekaran(1999); Yusuf et al. (1999); Sharp et al. (1999); Sanchez and Nagi (2001); Hopp and Oyen (2004); Sumukadas and Sawhney (2004); Nijssen and Paauwe (2012); Qin et al. (2015)
Performance Management	Ownership of outcomes,	Dyer and Shafer (2003); Shafer et al. (2001)
	Commitment management protocols	Dyer and Shafer (2003)
	Pursue a set of common goals across organisation, goal-setting around common performance metrics,	Shafer (1997); Nagel and Dove (1992); Goldman et al. (1995)
	Provide real-time and continuous feedback	Shafer (1997); Dyer and Shafer (1998); Youndt et al. (1996)
	Positive peer review, 360-degree reviews	Shafer (1997); Dyer and Shafer (1998)
	Focused on shared values	Shafer (1997); Dyer and Shafer (1998)
	Results-based appraisals	Lengnick-Hall et al. (2011)
Employee Communication	Surround communication	Dyer and Shafer (2003); Shafer et al. (2001)
	Open book management	Dyer and Shafer (2003); Shafer et al. (2001)
	Open information/communication environment	Shafer (1997); Gunasekaran (1999, 1998), Gunasekaran and Yusuf (2002), Yusuf et al. (1999), Meredith and Francis (2000), Meade and Sarkis (1999) and Maskell (2001); Lengnick-Hall et al. (2011); Ragin-Skorecka (2016)

	Joint employee–customer teams and networks	Lengnick-Hall et al. (2011)
	-Top-down: frequently communicating business information (both positive and negative), common performance metric, shared values, information from customers and alliance partners - Upward and lateral: employees across organisational levels and boundaries encouraged to share information	Shafer (1997); Dyer and Shafer (1998)
	Communication mechanisms : electronic forums, e-mail, intranets, electronic bulletin boards, meetings, surveys, chat groups	Shafer (1997); Dyer and Shafer (1998)
	Continuous socialization	Lengnick-Hall et al. (2011)
	Open architecture	Lengnick-Hall et al. (2011)
Employee Engagement	Employee involvement	Sharp et al. (1999), Sharifi and Zhang (1999, 2001), Zhang and Sharifi (2000), Gehani(1995), Gunasekaran (1999, 1998), Gunasekaran and Yusuf (2002), Forsythe (1997), Yusuf et al. (1999), Gehani (1995), Sahin (2000), Meredith and Francis (2000), Goldman and Nagel (1993) and Fliedner and Vokurka (1997); Alavi et al. (2014)
	Employee suggestions	Lengnick-Hall et al. (2011); Sumukadas and Sawhney (2004); Nijssen and Paauwe (2012)
	Taking a participative approach and have constant dialogue with their employees on the business planning	Wright and Snell (1998); Nijssen and Paauwe (2012)
	Promote suggestion schemes; quality circle programmes Facilitate employees’ participation in decision making processes	Duguay et al. (1997); Vernadat (1999); Owusu (1999); Meredith and Francis (2000); Hormozi (2001); Crocitto and Youssef (2003)
	Cultivate a creativity-stimulating atmosphere Develop and internalise the trust culture	Razmi and Ghasemi (2015)
	Develop cooperative relationships within an organisation and with customers and suppliers	Sherehiy and Karwowski (2014)
	Quality circles	Sumukadas and Sawhney (2004)
Empowerment	Empowerment	Sharp et al. (1999), Sharifi and Zhang (1998, 2001, 1999), Zhang and Sharifi (2000), Gehani(1995), Gunasekaran (1999, 1998), Owusu (1999); Vernadat (1999); Gunasekaran and Yusuf (2002), Forsythe (1997), Yusuf et al. (1999), Gehani (1995), Sahin (2000), Meredith and Francis (2000), Maskell (2001); Crocitto and Youssef (2003); Goldman and Nagel (1993) and Fliedner and Vokurka (1997); Lengnick-Hall et al. (2011); Alavi et al. (2014); Sherehiy and Karwowski (2014)

	Decentralised decision making	Yusuf et al. (1999); Goldman and Nagel (1993); Sharp et al. (1999); Maskell (2001); Sumukadas and Sawhney (2004); Ramesh and Devadasan (2007); Lengnick-Hall et al. (2011)
	-Build relational rather than transactional relationships with employees. -Minimise rules and procedures.	Lengnick-Hall et al. (2011)
	Focus on macro-management, Employees inspect their own performance.	Goldman et al. (1995)
	Eliminating management layers	Peterson et al. (2003)
	Power sharing	Sumukadas and Sawhney (2004)
	Experimentation (freedom to fail)	Lengnick-Hall et al. (2011)
	Develop self-management and self-leadership capabilities.	Lengnick-Hall et al. (2011); Sumukadas and Sawhney (2004)
Reward And Recognition	Recognise, appreciate, celebrate	Dyer and Shafer (2003); Shafer et al. (2001)
	Commensurate returns, awards, perks, rewards equal to commitment expected	Dyer and Shafer (2003); Shafer et al. (2001)
	Profit sharing, stock options	Dyer and Shafer (2003); Shafer et al. (2001); Goldman et al (1995); Sumukadas and Sawhney (2004); Crocitto and Youssef (2003)
	No payoffs for those who fail to adhere to the organisation's core values;	Dyer and Shafer (2003); Shafer et al. (2001)
	Awards or small bonuses for keeping commitments	Dyer and Shafer (2003); Shafer et al. (2001)
	Recognition and awards for taking on challenging assignments, for rapid learning, for acquiring new skills, for modelling agile behaviour, for sharing useful information	Shafer (1997); Dyer and Shafer (1998, 2003); Shafer et al. (2001);
	Reward schemes to encourage innovation and based on both financial and non financial measures (gifts, publicity and dinners)	Gunasekaran (1998); Sumukadas and Sawhney (2004)
	Compensation based on time, rate, and group performance on bottom line	Goldman et al (1995)
	Skill, knowledge or competency - based pay	Goldman et al (1995); Gómez-Mejía and Balkin (1992); Youndt et al. (1996); Lawler et al. (1992); Murray and Gerhardt (1998); Sumukadas and Sawhney (2004); Dyer and Shafer (1998,1999); Crocitto and Youssef (2003)
	Group-based performance incentives: Recognise and reward teamwork, Rewards and measures of success or objectives are based on individual and group performance	Goldman et al (1995); Youndt et al. (1996); Crocitto and Youssef (2003); Sumukadas and Sawhney (2004); Hopp and Oyen (2004); Lengnick-Hall et al. (2011)
	Improvement-based incentives	Sumukadas and Sawhney (2004)
	Compensation broad banding with	Shafer (1997); Dyer and Shafer (1998)

	pay levels based on market rates	
	<ul style="list-style-type: none"> -‘On-the-spot’ recognition e.g. public praise such as "pat on the back", notices on bulletin boards or newsletters, small cash awards, trips, special assignments, symbolic awards, and recognition such as in the spirit of "catching someone doing something right" -Giving teams small amounts of money to spread around in the form of instant cash awards to individuals or other teams for contributions above and beyond the call. -Compliments from customers find their way to appropriate individuals or teams 	Dyer and Shafer (1998)
Employee/ Labour Relations	<ul style="list-style-type: none"> -Deal with employee concerns about change, job security, moral -Heavy union involvement in creating shared vision, shared values and common performance metrics, and in solving business problem 	Shafer (1997)

2.8.4.2.1 Work Design

Dyer and Shafer (1998) define work design as the way in which work assignments are defined in an organisation. They argue that work design should be seen as the principal HR activity in agile organisations. It is because, work design impacts considerably upon other HR activities such as selection criteria, performance appraisals, and training and development.

Goldman et al. (1995) discuss that in traditional mass production, works were organised around products and product lines, whereas in agile and virtual organisations works are organised around core competencies and skills. Likewise, Bridges (1994) suggests that fast-moving organisations hire people and assign them to different projects which are changing and evolving over time.

Traditional job descriptions are not applicable in agile organisations. Instead, people are required to collaborate with various team leaders and to perform different tasks in various places. Consequently, the designs of individuals and team jobs easily change when core work

processes are changing. Works in agile organisations are redesigned by individuals and teams rather than the management on top or HR department (Shafer, 1997).

Furthermore, Dyer and Shafer (1998) believe that in organisations with fluid assignments, employees are well positioned to manifest agile behaviours. In other words, they are more likely to quickly redeploy, innovate, and learn and to be initiative and collaborative. However, as the application of fluid assignments has the potential to lose control and lead to chaos, they need to be supported by a series of HR activities that develop a sense of common purpose, ingrain core values, enhance competencies, and provide commensurate returns to employees.

2.8.4.2.2 Staffing- Recruitment and selection:

The potential aspects of staffing include selecting, employing, promoting, dismissing, as well as activities concerning retention of employees with desired competencies and capabilities (Qin and Nembhard, 2015). Wright et al. (1995) discovered that when the competencies of people recruited by an organisation concur with the organisation's current strategies, the firm can achieve higher performance. Accordingly, organisations which pursue agility should focus on agility capability development. Thus, their recruitment and selection, both at the initial employing and internal promotions should concentrate on acquiring employees with particular knowledge, skills, and mainly with respect to the attributes required for agility such as those outlined in Table 2.5 (Plonka, 1997; Dyer and Shafer, 1999; Zare Zardeini and Yousefi, 2012).

For instance, Plonka (1997) asserts that personnel representatives must systematically identify and prepare a list of essential workforce agility attributes based on experiences obtained in improving operations and processes and by interacting with production operators and managers. These attributes should be considered in establishing employee selection criteria as well as determining a basis for defining job assignments and performance assessment. Dyer and Shafer (1998) suggest that searching for agile attributes should be incorporated within an interview programme. The hired people not only should possess the necessary skills, knowledge and experience, but should also demonstrate agile attributes.

As the conditions of business change constantly, agile organisations need to be able to alter the numbers, types, and capabilities of their workforce to adapt and respond. For instance, Qin and Nembhard (2015) outlined a number of approaches for a quick adjustment of workforce capacity and capability (Plonka, 1997; Dyer and Ericksen, 2005,2006; Nijssen and Paauwe, 2012; Zare Zardeini and Yousefi, 2012) including an effective overall workforce planning, hiring, promoting, or dismissing, and a wide range of HR flexibility practices such as contingent employees, flexible working time, floaters, cross-trained workers, and multi-functional teams (Qin and Nembhard, 2015; Qin et al., 2015).

Others, such as Dyer and Shafer (1998) argued that while retention of core employees should be a priority, a contingent employee may supplement a core workforce (also Shafer, 1997; Pfeffer, 1994). Pfeffer (1994) suggests that using contingent employees can bring immediate and measurable financial benefits to organisations specially those under financial pressure. Similarly, Beatty (2005) believes structuring a workforce around skills and competencies and having an “on-demand” workforce who collaborate on a project basis and redeploy when needed, will bring agility to workforce management.

In terms of a re-evaluation of works, Beatty (2005) applied a work model, which classifies works into three categories including strategic, tactical, and non-strategic work. He predicts that agile companies would most probably own or rent the majority of their strategic works and relocate or outsource small part of them.

2.8.4.2.3 Talent Management

Dyer and Shafer (1998) report that most agile organisations deploy a ‘closed internal staffing system’. Their main recruitments are for entry-level assignments, so they use upper-level hires to fill hard-to-fill positions. They have extensive investments programmes to retain their core employees so they usually have relatively low voluntary turnover rates. Although they attempt to avoid layoffs, they have little hesitation in parting company with non-performers.

Employees in agile organisations are expected to take full responsibility for their own development and to constantly search for opportunities to enhance their competencies. Accordingly, organisations should provide them with information about future needs and

opportunities, and assure that all employees have access to resources for career counselling (Dyer and Shafer, 1998).

Staffing requires a real-time information system which correctly matches talents and opportunities (Shafer, 1997). Beatty (2005) also emphasises the importance of access to workforce data which provides accurate, comprehensive, meaningful business intelligence which is essential in making informed business decisions. However, having HR technology which provides centralised workforce data is not sufficient for comparing and consolidating information and making informed decision. In other words, while the development of an analytics platform with integrated data architecture is essential in agile HRM, companies also need to develop expertise to use the obtained data and to act upon it (Beatty, 2005).

2.8.4.2.4 Training and Development

Agility cannot be developed without leveraging employee knowledge and skills (Plonka, 1997, Goldman et al., 1995, Forsythe, 1997, Nagel and Dove, 1992, Gunasekaran, 1998). Goldman et al. (1995) strongly highlight the importance of systematic and continuous training and education for both the financial well-being of the company and the individual employee. In order for a company to be able to provide customers with individualised enriching products, services, and solutions, to move in various strategic directions, and compete in a broad range of markets, it needs employees with high levels of general and technical education. Agile companies also require workforces who are knowledgeable about their companies' capabilities, and are motivated and creative in providing enrichment opportunities for customers (Goldman et al., 1995).

Dyer and Shafer (1998) indicate that agile organisations encourage continuous learning as a shared value by investing considerable amount of time and money into training and development. In some agile organisations, these training and development opportunities are expanded beyond organisational boundaries to cover employees of suppliers, customers, and partners in virtual organisations. Although agile organisations should provide the training opportunities and resources, ultimately it is the employees who are responsible for their own learning and development (Dyer and Shafer, 1998).

A broad range of training and development designs are being used in organisations pursuing agility, especially assignment specific activities which take place "on the fly". In particular, just-in-time training such as individualised on-line instruction has been suggested as conducive to organisational agility. Moreover, action learning can be constructed in a way that develops agile attributes such as generative and adaptive behaviours (Dyer and Shafer, 1998).

Gunasekaran (1999) distinguishes between the nature and focus of training and education in agile organisations with a virtual enterprise and traditional organisation. For instance, in an agile organisation with globally distributed manufacturing companies, it is necessary to develop self-directed, international teams of empowered employees who can understand the culture and language of each other.

Cross-training has been considered as an effective strategy to foster workforce agility (e.g., Van Oyen et al., 2001; Hopp and Van Oyen, 2004; Nembhard et al., 2005; Iravani and Krishnamurthy, 2007). Hopp and Van Oyen (2004) suggested that cross-trained workers are able to perform a range of tasks, thus representing flexible capacity. They can be assigned to where they are needed when they are needed. Thus, cross-trained flexible workers can lead to a higher performance than that of specialised workers as organisations can achieve higher or the same performance with a smaller number of employees.

According to Qin and Nembhard (2015), training can also impact upon workforce agility indirectly through influencing factors that directly enhance workforce agility. For instance, it can positively improve employee involvement (Sumukadas and Sawhney, 2004), motivation (Zare Zardeini and Yousefi, 2012), cognitive abilities such as problem-solving and analytical thinking (Plonka, 1997), adaptability (Dyer and Shafer, 1999), and IT-skills (Forsythe, 1997; Gunasekaran, 1998).

2.8.4.2.5 Performance Management

The world of agile competitors requires adapted performance measures and standards which pursue a set of common goals across organisations, and correspond with the evolving characteristics of the new operation system (Nagel and Dove, 1992). Goldman et al. (1995) believe the traditional performance measurement system is an internal barrier to agility.

Traditional organisations due to segregated job design and assignment, have different measures for different functions which are not integrated to pursuing a set of common goals but instead lead different departments into conflicting goals.

Likewise, many organisations in Dyer and Shafer's (1998) study addressed the incompatibility of their regular performance reviews with organisational agility. The absence of assessors with the requisite knowledge for conducting performance appraisals compatible with fluid assignments has been identified as a main impediment for an agile performance management. Considering the increasing speed of change in agile organisations, the usual performance review methods such as 360-degree appraisals, appeared to be time-consuming, bureaucratic and very slow in indicating and correcting emerging performance deficiencies.

The perceived effective performance management practice in agile organisations is 'goal-setting around common performance metrics'. It suggests organisations give all employees a right to give and receive real-time and mainly informal performance related positive or negative feedback (Dyer and Shafer, 1998).

2.8.4.2.6 Reward and Recognition

Goldman et al (1995) compared the traditional model of compensation with its emerging model in agile-virtual organisations as Table 2.8 shows:

Table 2.8: Comparison between traditional model and agile model of compensation, Source: based on information collected from page 365-376 (Goldman et al., 1995)

The Traditional Model	The emerging Agile-Virtual Model
Compensation based on time and rate	Compensation based on time, rate, and group performance on bottom line
Task-based compensation rate	Skill -based compensation rate
Use only individual performance metrics	Recognise and reward teamwork Rewards and measures of success or objectives are based on individual and group performance
Employees get salaries and the corporation gets profits	Employee compensation is based on profit

Based on the contingency theory of compensation strategy proposed by Balkin and Gomez-Mejia (1987), the effectiveness of a compensation system depends largely on the alignment between compensation strategies and organisational and environmental situations. Following this theory, the authors asserted that when flexibility and adaptability are the strategic

objectives and the organisation experiences numerous changes in technology and organisational structure, skill-based pay seems to be an appropriate strategy (Gómez-Mejía and Balkin, 1992).

Lawler et al. (1992) similarly suggest that skill-based pay encourages cross-training and team-work. It concurs with Murray and Gerhardt's (1998) view that suggests skill-based pay fosters skill acquisition, strengthens job design, enhances productivity and quality, and reduces costs.

Sumukadas and Sawhney (2004) believe the non-traditional reward practices are more effective in promoting workforce agility due to enhancing collaborative, training, and multi-tasking efficiencies. For instance, improvement-based incentives foster a culture of change; Skill-based pay systems reward employees for the variety and depth of their skills; Non-monetary incentives or recognition awards such as gifts, publicity and dinners reinforce power sharing and also directly influence workforce agility.

The following compensation methods are commonly applied by agile organisations as reported by Dyer and Shafer (1998):

- Compensation broadbanding with pay levels based on market rates
- Employees are awarded for sharing useful information, learning new skills and working in fluid assignments by occasional and temporary use of skill/ competency-based pay
- Generous use of contingent compensation such as large upside bonus potentials, stock options for all employees
- To enhance a sense of ownership and encourage spontaneous collaboration, some organisations have pay-out pools for contingent compensation based on a combination of project /unit /organisation-wide performance (based on common performance metrics)
- Individual pay-outs based on a combination of individuals' contribution and compliance with core values. It is a recognition for modelling agile behaviours (Shafer, 1997)

2.8.4.2.7 Employee Communication

Dyer and Shafer (1998) believe that employee communication is a central HR activity which facilitates change, adaptability, and learning and connects and interlinks all other HR activities

together. The employee communication mechanisms can include electronic forums such as e-mail, intranets, and electronic bulletin boards and also ordinary mechanisms such as meetings involving customers, suppliers, and alliance partners. They suggest that agile organisations should build their employee communication based on the following principles:

- Communicating vision, values, and common performance metrics continuously
- Communicating business and marketplace status (positive and negative) regularly
- Distributing information from customers and alliance partners broadly across the organisations
- Obtaining real-time and seamless flows of information both upward and lateral and across organisational levels and boundaries
- Conducting surveys, chat groups, skip-level forums to learn from their employees
- Employees share all relevant information and identify their own information needs
- Employing a wide range of communication mechanisms to spread new ideas and learning

2.8.4.2.8 Empowerment

Empowerment is perhaps the most common practice that has been advocated by agility researchers to enhance workforce agility (see Table 2.7). In particular, decentralised decision making has been considered as an effective approach for improving employee involvement, accelerating decision making processes, and reducing response times (eg. Yusuf et al., 1999; Sharp et al., 1999; Maskell, 2001; Sumukadas and Sawhney, 2004; Lengnick-Hall et al., 2011). Job control and autonomy enhance employee motivation and makes them more responsive and productive (Sumukadas and Sawhney, 2004). In contrast, lack of involvement reduces acceptance of change (Alavi et al., 2014).

2.8.5 Agility-Oriented SHRM: New Roles and Mission

This review identified three main categories of role for HR that influence organisational agility, which are mainly derived from the identified AOHR principles. These roles consist of:

- a) Identifying and developing workforce agility capabilities -the requisite skills, knowledge, mindsets and behaviours for agility.
- b) Managing workforce scalability
- c) Creation of a facilitative organisational context for agility. This includes:
 - c-1) Designing a supportive HR system (Dyer and Shafer, 2003)
 - c-2) Creation of a cultural foundation for agility
 - c-3) Helping to build an agility-oriented (a highly adaptable) organisational infrastructure
 - c-4) Developing leadership

2.8.5.1 Identifying and developing workforce agility capabilities -the requisite skills, knowledge, and behaviours for agility

The promotion of necessary employee behaviours and mindsets is highlighted as the most critical responsibility of HR. For instance, Dyer and Shafer (2003:53) proposed for dynamic organisation, “the basic task of HRS is to foster, in the context of other features of organisational agility, the employee mindset and behaviours required to achieve marketplace agility.”

The attributes of an agile workforce or as called by this research, the workforce agility capabilities were discussed in section 2.7.2. After identifying the requisite workforce agility capabilities for organisational agility, the next HR challenge is to obtain these capabilities through a supportive HR system, and by selecting and implementing a synergistic bundle of appropriate HR policies and practices. A comprehensive review of the HR principles and practices appropriate for dynamic organisations is done and presented in section 2.8.4 of this review.

2.8.5.2 Achieving Workforce Scalability

Strategic agility requires a continuous reallocation of resources and organisational capability referred to as resource fluidity by (Doz and Kosonen, 2008), which is the capability to reconfigure business systems and redeploy resources rapidly. This involves both the alignment and fluidity of the organisation's vital resources, inclusive of its human resources (Dyer and Erickssen, 2006, 2007). This underpins another critical role of HR which is ensuring that a fast and easy configuration of human resources and their competencies is possible whenever business demands. Shill et al. (2012:12) similarly highlights the criticality of this HR role by asserting that the issues of HR not acting "at the speed of opportunity" is the reason why many organisations have slow organisational reflexes.

This role consists of managing the configuration of four HR dimensions including headcount, collective competences (distribution of knowledge and skills), deployment patterns (workforce assignments across organisational and/or physical locations), and contributions (organisational value of the performing tasks) (Dyer and Erickssen, 2006,2007).

It is associated with "workforce scalability", an organisational agility capability specified by Dyer and Erickssen (2006:11) which is defined as: "the capacity of an organisation to keep its human resources aligned with business needs by transitioning quickly and easily from one human resources configuration to another and another, ad infinitum". They defined two dimensions for workforce scalability as workforce alignment and workforce fluidity.

Workforce alignment is about getting "the right number of the right types of people in the right places at the right times doing the right things right." Workforce fluidity involves an easy, rapid, seamless and efficient move of employees (whether an individual or a group of employees) and their subsequent behavioural adjustment.

Nijssen and Paauwe (2012) argued that workforce scalability requires a complementary perspective to strategic fit and flexibility (Wright and Snell, 1998) as both are required for organisational effectiveness. Accordingly, they related workforce alignment and fluidity to the concepts of fit and flexibility respectively.

Achieving workforce scalability involves integrated practices across different HR domains.

For instance, the way talent is sourced and deployed; the way capabilities and skills are developed to meet both current and future business needs; and the way HR promotes change management capabilities across the organisation. This is where agility-oriented workforce management practices in the areas of work design, staffing, workforce planning, talent management, and training and development are becoming critical (Qin and Nembhard, 2010).

Dyer and Erickssen (2006), however, highlighted nine guiding principles for pursuing workforce scalability, as listed in Table 2.6 and shown in Figure 2.8. Workforce alignment can be achieved through the implementation of formal HR planning, and a workforce that shares a common mindset comprising orientation and devotion to the organisation's vision and bottom line organisational performance and success by understanding the business, and accepting shared responsibility for the company's success.

It also requires employees to be change-ready by quickly adjusting to new strategic directions issuing from the top leaders or in a better degree of responsiveness, as suggested by Mintzberg and Waters (1985) to being able to scan and interpret external change early and initiate appropriate strategic moves on their own. Dyer and Erickssen (2006), further introduced two other key sub-principles for facilitating workforce alignment as: creating a common cause and embedding contextual clarity. They argued these principles prepare employees to comprehend the reasons behind changes in business and HR directions/configurations and to adapt accordingly or to proactively initiate.

The authors also highlighted the criticality of talent management practices for achieving workforce fluidity. They discussed how workforce fluidity requires a simultaneous consideration of external staffing and internal transitions. For increasing the fluidity of external staffing they suggest to pre-qualify sources of applicants (or the applicants themselves) on the input side, and to routinize outplacement processes on the output side. Nijssen and Paauwe (2010) argued for enhancing workforce fluidity, the principles of agile supply chains can be applied in the practice of 'workforce supply management'. It includes the principles of postponement-i.e. "carrying an inventory in a generic form, awaiting final localization" and the quality of supplier relationships (Christopher, 2000).

The fluidity of internal transitions can be improved by simultaneously enhancing three aspects of capability, opportunity, and motivation of employees to facilitate their internal movement and their adaptation to different situations. Employees' capabilities can be developed by enriching the talent pool and facilitating interpersonal connectivity. Opportunity can be increased by expanding role orientations and unleashing the talent pool, and motivation of employees can be improved by aligning incentives (Dyer and Ericksen, 2006). This is in tune with the AMO model (Blumberg and Pringle, 1982; Gutteridge, 1983) discussed in section 2.8.1.3

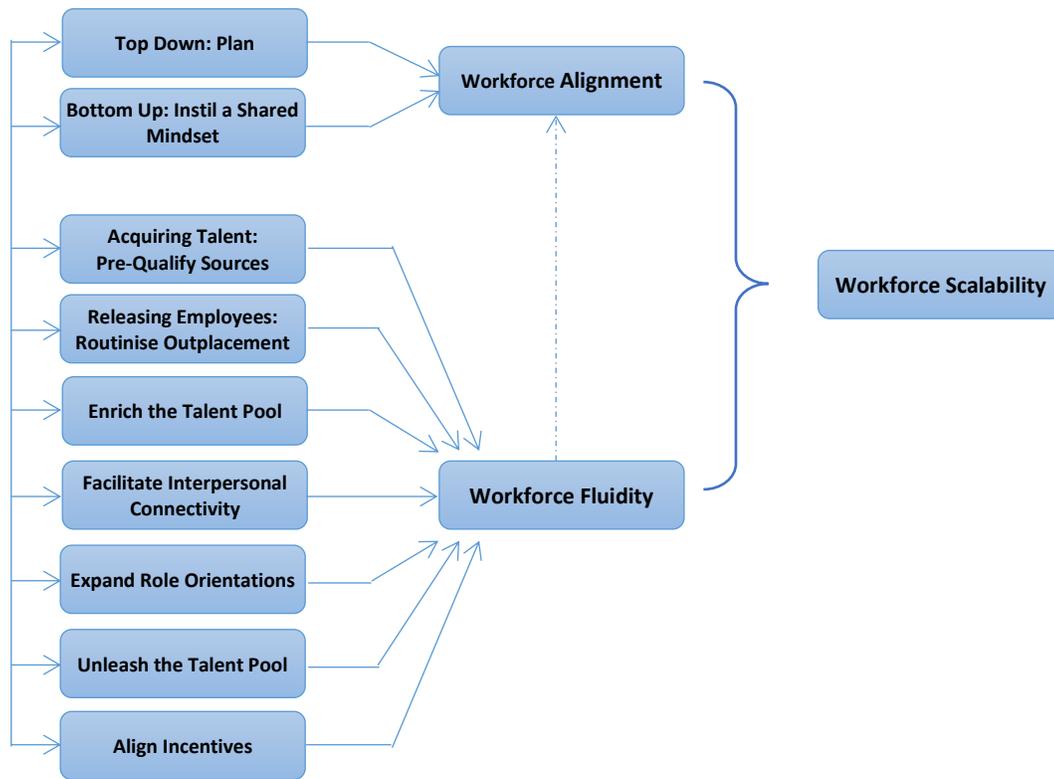


Figure 2.8. Guiding Principles for Pursuing Workforce Scalability, source: Dyer and Ericksen (2006:17).

Nijssen and Paauwe (2010) identified a series of organisational practices associated with workforce scalability and outlined that implementing these practices is a shared responsibility of HR professionals and management. Table 2.9 shows the identified organisational practices:

Table 2.9: Organisational Practices to Develop Workforce Scalability, Source: Nijssen and Paauwe (2010)

Key competency for agile organisations		Organisational practices to develop the competencies
Workforce scalability	Workforce alignment	Open (workforce) planning Creating a shared mindset Employee participation
	Workforce fluidity	Building relations with suppliers of human resources as well as potential employers of the workforce Competence based training Training aimed at building a broad skill set (e.g. cross training and job rotation) Discretionary work design (relying on own initiative) Allowing organisational slack

Very much related to the issue of workforce scalability, Bhattacharya and Wright (2005) identified three categories of uncertainties associated with human assets named as uncertainty of returns, volume and combinations, and uncertainty of cost. As Table 2.10 shows, these uncertainties are mainly related to the suitability and adequacy of employees' skills, the productivity and performance of employees, the number of employees and the combinations of skills that they individually and collectively possess, and the costs of human assets, in the form of wages, salaries, benefits etc. These elements are similar to the four scalability-related HR dimensions that Dyer and Erickssen (2006) identified -i.e headcount, collective competences, deployment patterns, and contributions.

Bhattacharya and Wright (2005), while they did not explicitly take a strategic agility lens, applied 'real options' theory⁶ to HRM for managing people in an uncertain world through the investigation and analysis of the uncertainties associated with human assets. They proposed a HR 'options' model for identifying various forms of uncertainties of human assets and managing them through a system of HR practices.

⁶ The real options theory suggests that organisations should build capabilities to proactively manage uncertainties in order to respond to unpredicted changes. These capabilities can be considered as 'options' (Kogut and Kulatilaka, 2001) when they enable the firm to heuristically respond to uncertainties by reducing the costs of adjustments to changes, maintaining value, and facilitating flexibilities of decision and operations (Bhattacharya and Wright, 2005).

According to Bhattacharya and Wright (2005), HR options are investments in the human capital pool of an organisation that provide the capabilities to proactively respond to future contingent events and changing business conditions. Each type of uncertainty can be managed by certain HR practices. For instance, organisations facing high levels of skill obsolescence risks, require larger number of new skills, so need to apply a greater number of growth and learning options through HR practices such as “training for new or upgraded skills, fostering learning, selectivity in recruitment for broad-based learning skills, and skill based compensation plans.” (Bhattacharya and Wright, 2004:21)

Table 2.10: Uncertainties of Human Assets, Source: Bhattacharya and Wright (2005:934)

UNCERTAINTIES	SOURCES OF UNCERTAINTIES		
	INDIVIDUAL	FIRM	MARKET
Uncertainties of return - Skill obsolescence - Demand for future skills - Human capital loss - Loss of productivity	- Erosion of existing skills - Inability to learn new skills - Employee dissatisfaction, lack of commitment - Voluntary turnover	- Skill profile mismatch with market requirements - Turnover of critical skill group - Inability to generate/accommodate new skills and learning - Inability to institutionalise knowledge - Lack of employee development - Lack of concern for employees	- Demand for new skills - Uncertain supply of new skills - Uncertain demand for existing skills - Changing career patterns
Uncertainties of volume and combinations - Variations in number of employees required - Variations in deployment of human assets	- Absenteeism, leave - Resistance to changes in work arrangements	- Variations in demand for number of employees in different units/jobs - Lack of slack/buffer, high human capital leverage	- Variations in demand for and supply of goods and services
Uncertainties of costs - Variations in total employee outlay vis-à-vis cash flow	- Overuse/misuse of benefits - High guaranteed pay/bonuses	- Variations in profitability - High financial leverage	- Business cycles - Competitive pressures for cost reduction

2.8.5.3 Creation of a Facilitative Organisational Context for Agility

A facilitative organisational context for agility includes a supportive HR system which creates the required attributes and capabilities among employees, a strategic culture which is aligned with the requirements of strategic agility, a highly adaptable organisational infrastructure which fosters fluidity, promotes decentralised decision making, and facilitates the full and timely flow of information, and finally an agile leadership.

2.8.5.3.1 Designing a Supportive HR System

It has been discussed that HR, to foster the desired employee mindset and behaviours and to enhance the alignment and fluidity of human resources needs to pursue particular people management principles and to employ a synergistic bundle of appropriate HR policies and practices. This review indicated that HR can facilitate the development of organisational capabilities for agility by strategically managing human resources through a highly dynamic HRM system. HRM system is defined as the collection of HRM principles, policies and practices of an organisation which aim at attracting, developing, motivating and retaining an organisation's human assets (Jackson and Schuler, 2003; Lado and Wilson, 1994). HR principles provide directions to align HR policies and practices (Colbert, 2004; Lepak et al., 2004). The characteristics and dimensions of an AOHR system were discussed in section 2.8.4.

2.8.5.3.2 Creation of a Cultural Foundation for Agility

According to Barney (1986) a culture can be considered as an asset when it is aligned with an organisation's strategy, and promotes behaviours that the intended strategy requires. Many authors link the challenge of agility to organisational culture (Glenn, 2009; Accenture 2013; CIPD 2014) and some consider it as a very important element in developing agile people attributes (e.g. Breu et al., 2002; Cabrera and Cabrera, 2005).

For instance, Cabrera and Cabrera (2005) argued that in order to have a generative workforce who actively share information and knowledge, organisational culture should establish an environment of trust and openness in which individuals are encouraged to share information and knowledge. It can be derived that culture is largely associated with

several people management practices, and hence HR can play a critical role in creating and maintaining the supporting organisational cultures for agility (CIPD 2013,2014; Accenture, 2014).

Dyer and Shafer (2003) assert that HR is responsible for embedding a “stable inner core” deep into the organisation as an element of the agility-oriented organisational infrastructure. The stable inner core consists of three elements including “a clearly articulated vision, an equally clearly articulated set of shared values and finally a few important common performance metrics that capture the essence of marketplace agility” (Dyer and Shafer, 2003:20).

More detail about the characteristics of organisational culture conducive to agility is provided in Table 2.11. Although few of the authors mentioned that developing such a culture is the task of HR, this research argues that HR can help building such a culture by instilling the desired set of shared values into an organisation directly through training and development, communication, leadership development, change management, and indirectly by performance management, and rewards and recognition.

This argument is supported by Cabrera and Bonache (1999) and Barney’s (1986) assertion that is “a strong strategic culture can be created through two processes: planning HR practices that are aligned with the organisation's strategy to promote the desired behavioural norms, and deliberately selecting candidates who share the desired values.” (cited in Lengnick-Hall et al., 2009:66)

Similarly, Accenture (2013) argued that HR can contribute in achieving a culture of continuous learning by facilitating continuous acquisition of new skills. They advocated learning and development practices such as informal and peer-to-peer learning, and employing quick learners. Likewise, Denning (2015) argued that an established agile culture needs to be protected from infection with traditional control-minded management practices. Thus, compatibility with the culture need to be an explicit requirement in recruitment processes.

Table 2.11- Characteristics of Organisational Culture Conducive to Agility

Characteristics of organisational culture conducive to agility	Authors
Positive attitude toward learning	(Goldman et al., 1995; Plonka, 1997; Meredith and Francis, 2000; Stekelenburg, 2012; CIPD, 2013)
Experimentation and Learning Experiment more frequently and learn more quickly	Accenture (2013)
Autonomy in Decision Making and Empowerment Agility is not about micro managing Principle of “don’t think, just do what you are told” is belong to mass- production era and will not work for an agile company.	(Goldman and Nagel, 1993; Kidd, 1994; Van Oyen et al., 2001; Breu et al., 2002; Gunasekaran, 1998; Strader et al., ;1998; CIPD, 2013)
Diffused Power and Accountability: Promote self-organisation, dispersed influence, individual and group accountability.	Lengnick-Hall et al. (2011); Denning (2015)
Trust, openness, honesty, prudent risk-taking, mutual respect, and personal accountability	Dyer and Shafer (2003).
Autonomy and Trust: - Increasing trust and reducing fear - Shifting the balance from control to freedom - Cultivating a high-trust environment and injecting more autonomy into every practice and policy	CIPD (2013)
Nurturing Innovation and Creativity - Assist employees to become more confident and competent in thinking creatively and trying new ideas - Equipping people with innovation tools - Allow them free time for “thinking, de-stigmatize failure, and creating opportunities for serendipitous learning”	CIPD (2013)
Climate of Psychological Safety - Employees perceive their work environment as conducive to taking interpersonal risks. - They feel safe when asking questions or seeking information or help, admitting mistakes, or experimenting.	Lengnick-Hall et al. (2011)
Adaptable: - Change management considered as a broader enterprise capability and constantly upgrading the change capabilities of leaders and the entire workforce. - Effective collaboration - Wide distribution and free flow of information - Quick sharing of perspectives from across the organisation - Rapid decision making	Shill et al. (2012)
Transparency and Openness - A committed and clever approach to transparency - Less hierarchical and more collaborative, adaptive, ethical and empowered.	Accenture (2013)

2.8.5.3.3 Helping to Build a Highly Adaptable Organisational Infrastructure

Creation of workforce agility is very much influenced by organisations' physical and structural foundations (Breu et al., 2002). In addition, for organisations to take advantage of opportunities, HR must be able to quickly and easily reconfigure workforce capabilities and transit from one human resources configuration to another. This not only requires a very flexible workforce, but also a highly adaptable organisational infrastructure.

Nijssen and Paauwe (2010) discuss that the best organisational design matching agility is 'organic' design which includes flat hierarchical organisation, minimal formal (functional) authority, flexible procedures, mutual adaptation (coordination through informal communication) and a minimal level of routinisation and standardisation.

Likewise, Sherehiy et al. (2007) claimed that adopting the characteristics of the organic organisation will lead to adaptability, flexibility and agility. Based on his review, the main features of 'organic' design include: "few levels of hierarchy, informal and changing lines of authority, open and informal communication, loose boundaries among function and units, distributed decision making, and fluid role definitions (Lawrence and Lorsch, 1967; Ashby, 1956; Hatch, 1997; Vecchio, 2006)."

According to Dyer and Shafer (2003), an agility-oriented organisational infrastructure, beside a relatively stable inner core, consists of four reconfigurable elements including fluid organisation design, flexible core business processes, distributive information systems, and adaptable workplace design.

This research argues that HR functions can contribute to building such an infrastructure by shaping organisational structure through the way in which work assignments, job descriptions, autonomy, decision making power, mobility, cross-functional activities and career paths are defined. It can particularly contribute by creating a working environment which facilitates agility through promoting open communication and knowledge/information sharing practices.

A report by CIPD (2014) indicates that 47% of HR leaders in their study, particularly those from the public sector, used organisational re-design and restructure as a tactic to improve

their organisational responsiveness to change. These included the implementation of smart and agile working practices which became widespread among UK organisations (CIPD, 2014).

2.8.5.3.4 Developing Leadership

The importance of an empowered workforce has been widely cited in agility literature (Sherehiy et al., 2007; Sharifi and Zhang, 1999; Gunasekaran, 1999; Breu et al., 2002). Many authors agree (such as Goldman et al., 1995) that an agile environment needs managers to focus on macro-management, so employees inspect their own performance.

Shill et al. (2012) assert that agile organisations need senior leaders with a specific mix of personal attributes including “individuals who demonstrate a range of skills, are clearly comfortable with ambiguity and are respectful of but not slaves to process. They understand the difference between influence and authority... Their focus isn’t on hierarchy; it’s on ideas, information, creativity, flexibility, candour and curiosity”.

Joiner and Joseph (2007 and 2009), who conducted an extensive research on leadership agility, define leadership agility as “the ability to lead effectively under conditions of rapid change and high complexity and when success requires consideration of multiple views and priorities. It requires a process of using enhanced awareness and intentionality to increase effectiveness under real-time conditions: stepping back from whatever one is focused on, gaining a broader perspective and bringing new insight into what needs to be done next” (Joiner and Joseph, 2009:29).

They related leadership agility competencies to a specific set of mental and emotional capacities, that can be learned and developed. Leadership development activities need to simultaneously concentrate on the development of individual leaders, leadership teams as well as the leadership culture. As suggested by Joiner and Josephs (2009), developing and enhancing the leadership culture is a collective task which requires the collaboration of leaders and HR professionals. This is where HR can contribute to the development of leadership agility by undertaking the following activities:

- Assessing the current agility levels (of individual managers, teams and leadership cultures)
- Clarifying the desired level of leadership agility

- Plan for developmental programme to close the gap between existing and desired agility levels

2.8.6 Agility of HR Function

HR has a history of being criticised for playing an anti-agility role, due to its operational and bureaucratic focus, and inability to keep up with change (Lengnick-Hall and Lengnick-Hall, 2002:139). For instance, Ulrich (2009) suggests HR function often does not have the necessary agility to effectively manage people and accomplish the overall business strategy, let alone to go beyond strategy and link the HR strategy with environmental factors and stakeholders’ requirements. Correspondingly, HR is listed among the least agile departments in an Economist report (Glenn, 2009).

In the same vein, Horney (2016) related the main barriers for HR agility to the issues of HR experience, structure, process and technology as shown in Table 2.12.

Table 2.12: HR Barriers to Agility, Source; Adopted from Horney (2016:24)

<p>HR Experience Barriers</p> <ul style="list-style-type: none"> - Limited strategic business competencies - Emphasis on technical/ administrative competencies - People programs not aligned to support business objectives or desired behaviours 	<p>HR Structure Barriers</p> <ul style="list-style-type: none"> - Ineffective, redundant decentralized function - Unclear and overlapping roles and responsibilities - Large, fragmented centralized function - Limited tools/data to make effective HR resource allocation decisions
<p>HR Process Barriers</p> <ul style="list-style-type: none"> - Ineffective, redundant processes - Low customer satisfaction - Insufficient measurement processes - Outdated processes - No sharing of best practices 	<p>HR Technology Barriers</p> <ul style="list-style-type: none"> - Inflexible, incompatible HR information systems - Limited access to critical information - Little leveraging of technology to streamline work processes

Accenture (2013) asserts that HR in order to assist the organisation to become agile, needs to become nimble itself. This implies that HR reshapes itself, while reinventing the HR and talent management practices. They highlighted the importance of HR organisational structure, the application of AOHR practices inside the HR department itself, and building internal networks with employees, people from other functions and also external contractors, vendors and partners in order to co-create HR processes and solutions rather than dictating the policies and practices to their customers (customers of HR department).

For instance, they suggest that HR professionals themselves should have job descriptions

which allow more fluidity and flexibility and enable them to collaborate on a project basis with an expanded ecosystem of people from the business, and other supporting functions such as IT or facilities to settle particular talent issues.

Wright et al. (2011) in a study of identifying HR top challenges, indicated the issue of talent management as a greatest universal challenge of HR, while pointing out that HR function has its own talent challenges to be addressed. The findings from European participants marked transformation of HR function as the most challenging aspects of HR role, with HR competencies, processes, resources and technology, as the main obstacles in accomplishing HR priorities. In particular, the authors highlighted the challenge of HR skills and internal capabilities and suggested that organisations should put more investment and efforts in developing HR functional capability through reskilling, retraining and the continuous education of HR teams.

Ananthram et al. (2013) assert that the ‘strategic business partner’ (Ulrich et al. 2009) or ‘strategic architect’ roles (Lepak and Snell, 1999) appropriately reflect the HR managers and HRM professionals’ responsibilities in the context of strategically agile firms. The authors argue that the Ulrich et al.’s (2009) strategic business partner model, with its six components of role shown in Table 2.13, particularly implies that HR professionals should design adaptive HRM systems and processes to be able to rapidly respond to changing business requirements.

Table 2.13: The Six Components of Strategic Business Partner Role Based on Ulrich et al.’s (2009) SHRM Model

- “Business-driven: ensures the vertical alignment between business and HRM strategies;
- Strategic architect: addresses the structural aspects of HRM;
- Stakeholder manager: manages relationships between all organisational stakeholders;
- Workforce designer: attends to talent attraction and retention;
- Culture and change agent: facilitates broad organisational change in response to internal and external environments” (Nankervis et al. 2011: 26–27: cited in Ananthram et al. (2013)).

The subject of competencies of HR professionals has been studied by a range of authors (such as Skinner and Mabey, 1997; Ulrich, 1997; Brockbank and Ulrich, 2002; Schuler et al., 2003; Boselie and Paauwe, 2005). However, it has been more investigated with respect to the relationship between HRM and performance, but the issue of what HR competencies

are necessary for agility and how they can contribute to organisational responsiveness and flexibility have not been discussed.

In addition, the issue of how to bring agility to the operational aspects of HR has not received sufficient attention in previous works. One study identified in this relation, is done by Wijewardena (2011), a case study of a mid-sized offshore software development company in Sri Lanka, which introduced an agile practice, KANBAN, to its HR department.

The company implemented KANBAN within their HR department, in line with the agile concepts, that they had successfully employed to their project organisation, hoping to increase the productivity of HR operations and to overcome the impediments they were experiencing with their traditional HR model.

The report indicates that the employment of KANBAN as an agile method resulted in positive outcomes. “The HR department and the project organisation of the company started to work more closely, with a better understanding of each other’s capacity, priorities and the expected level of quality. This created a culture, which is focused more on solutions, instead of different entities trying to pass the buck” (Wijewardena, 2011:166).

In summary, while this review identified a series of important roles for HR function in agility development, none of the previous works has explored the agility of HR function itself. Reviewing the previous SHRM research, while the issue of HR function effectiveness has been studied with respect to the relationship between HRM and organisational performance, the specific characteristics and competencies of HR function with respect to organisational agility, responsiveness and flexibility have not been discussed. The main issues which remained unaddressed are as follows:

- How agility can be approached and adopted by HR function itself?
- How HR function, and its competencies, structure, processes, resources and technology should be reengineered in a way that can meet the requirements of agility?

2.9 A Preliminary Conceptual Framework for Agility-Oriented SHRM

A preliminary conceptual model of AOHR strategy was developed at the very early stage of the research, after an initial review of the literature. The preliminary framework has been gradually modified and reshaped through an iterative process during the course of the research, as insight from the empirical part of the study and the newly identified literature enriched the researcher understanding about the subject. This section presents the preliminary framework at its initial stage. The section introduces the building blocks of the conceptual model, the interrelationships and connections between different components of the model, and its underlying assumptions.

The preliminary conceptual framework of AOHR strategy was developed built on the foundation of Zhang and Sharifi's agility model (2000) (see Figure 2.3) and on the basis of the AOHRM model proposed by (Shafer et al., 2001). The reason behind combining these two models was the limitation of existing AOHRM models in paying attention to the dynamics of both the business environments and the organisational agility related competencies. The Sharifi and Zhang (2000) methodology for achieving agility could help to overcome these issues as it provides a comprehensive foundation for strategy making and implementation in turbulent environments by explaining how a dynamic and fluid business context (agility drivers) shall be interpreted into the strategic position and direction of a firm, while addressing both process and content approaches to strategic management. Their model is also broadly cited and recognised as holistic and concise by many authors including Sherehiy (2007).

The main constituent parts of the preliminary framework are agility drivers, workforce agility capabilities, and HR agility providers as shown in Figure 2.9. The framework locates workforce agility capabilities as the central part, following the Shafer et al. (2001) conceptualisation of AOHRM, which considers 'agile people attributes' as key defining factors in crafting a HR strategy. Following the same perspective, the process of crafting an AOHR strategy starts with an evaluation of agility drivers and an identification of necessary workforce agility capabilities to cope with the drivers and finally a determination of HR agility providers to achieve the desired workforce capabilities.

2.9.1 The Components of the Model

1) Agility Drivers: Agility drivers are contextual factors representing the characteristics of the external and internal business environment which lead the organisation to adopt an agility strategy and influence the HR choices for strategic action (adopted from Zhang and Sharifi (2000))

2) Workforce Agility Capabilities: Workforce agility capabilities are the required combinations of skills, knowledge, mindset and behaviours of workforce that provide the fluid and flexible resources necessary for achieving agility.

3) HR Agility providers: HR Agility providers refer to the means by which the required workforce capabilities could be achieved. These providers comprise appropriately designed elements including AOHRM principles and practices that an organisation adopts to develop necessary workforce capabilities.

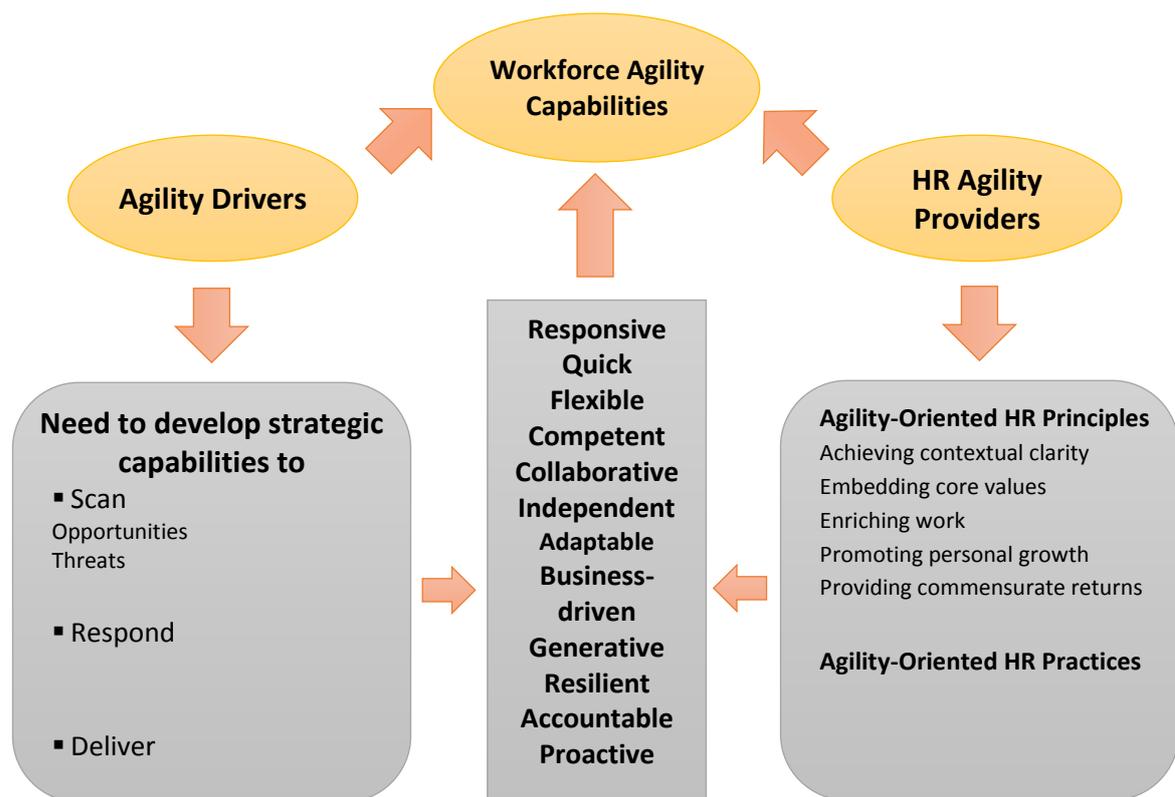


Figure 2.9- The Preliminary Conceptual Framework for AOHR Strategy

The framework was built on the following basic assumptions:

1. Assumed agility as a strategic direction for organisations to build ability to scan continuous and unpredictable changes in the external environment, quickly and efficiently adapt and respond to change especially customers' dynamic demands and proactively taking advantage of change as opportunity (Sharifi and Zhang, 1999; Zhang and Sharifi 2000).
2. The changing characteristic of business environments forces organisations to adopt an agility strategy to sustain the competitive advantage by responding quickly and appropriately to, and take advantage of changes (Sharifi and Zhang, 1999). The changes, which are agility drivers, encompass all factors and pressures from business environment that influence the firms' business.
3. Considered 'workforce agility capabilities' as pivotal in achieving strategic agility, and similar to the models suggested by Shafer et al. (2001), regarded them as the key defining factors in crafting a HR strategy, thus directing the selection and adoption of appropriate HR principles and practices to create those capabilities.
4. Workforce capabilities for agility can be developed through strategic HRM which fosters agility-oriented mindset and behaviours among employees, and eventually supports an organisation to achieve the organisational capabilities required for thriving well in its unpredictable competitive market.
5. Different organisations a result of performing in various business environments, experience different agility drivers, thus, need different levels of workforce agility and consequently different types of workforce agility capabilities.
6. Although, the previous HR-agility studies (Shafer et al., 2001; Dyer and Shafer, 1999, 2003; Dyer and Ericksen, 2006) tend to assume a HR strategy generally applicable for all dynamic organisations, the preliminary framework followed the arguments of Sharifi and Zhang (2000), and assumed that the necessary 'organisational and workforce agility capabilities' are specific to the unique circumstance of each organisation, therefore the components of an AOHR strategy, particularly the required 'HR practices' are context-specific and cannot be universally applied across different firms.

2.10 Summary and Research Gaps

Existing research makes important contributions to understanding human aspects of organisational agility, and identifying the human factors that are critical to the achievement of agility. It provides insight about the way that HR function can contribute in achieving organisational agility, although only narrowly addressing the potential roles that HR can play in implementing agility strategies.

It clearly indicates that the development of an AOHRM is an important aspect of strategic agility, as it has major impacts on the achievement of organisational agility capabilities such as strategic sensitivity, flexibility, responsiveness and resource fluidity. In particular, an AOHRM will help organisations to adapt to changing business conditions by attracting, developing, retaining employees with agility capabilities and deploying their competencies on various assignments, functions and projects, and motivate them to manifest agile attributes by adopting an appropriate bundle of AOHR principles and practices. It sheds light on the reasons why the majority of the attempts to achieving agility are not successful and suggests some key human-related factors that might be overcome and why.

The previous research identified important pinpoints, main constructs and features constituting the HRM supportive for agility, and identified principles and approaches by which AOHR systems can be directed and how workforce agility, which is at the heart of AOHRM, can be obtained. A group of studies by Dyer and Shafer and their colleagues including (Dyer and Shafer, 1998, 2003; Shafer et al., 2001; Dyer and Ericksen, 2006) built the main theoretical basis of this review.

While existing research provide insights on the dimensions of an AOHR system, the characteristics of a supportive HR system to strategic agility has not been explored in great detail and consequently has not been theorised well in the SHRM-agility literature. Especially in the context of a highly dynamic and complex business environment, where the main challenge is to remain strategically agile through the continual and rapid reconfiguration of business strategy and organisational arrangements, the modification, renewal, or adaptation of the HR system and its components which are as important as the selection and formation of the system in the first place. However, we understand little

about how HRM systems and their components should renew and reshape in response to contextual contingencies.

The existing AOSHRM models have not discussed the contextualised nature of HRM. While, several studies on flexibility (such as Ruiner et al., 2013) assert that HRM systems and their components are not static, previous AOSHRM studies have not examined the reciprocal dynamics through which HRM systems are impacted (and impact) by organisational contingencies.

Accordingly, we do not fully understand the processes through which workforce agility capabilities are identified and renewed in the context of increasingly changing business conditions and how HR practices change over time in response to various strategic directions. In other words, dynamic interaction of AOHR systems with both internal and external environments, and continuous renewal of workforce agility capabilities, and components of HR system are identified as the missing elements in the existing theories and models of AOSHRM which have not yet been examined in the conceptual and empirical research on AOHRM.

While the extant works adopt a contingency perspective (Dyer and Ericksen, 2006) or take a middle ground between contingency and best-practice perspectives (Dyer and Shafer, 2003), arguably, they have a rather static view to the formation and management of HRM systems. Although they acknowledged the importance of tailoring an organisation's HR strategy to fit with its business strategy, they tend to regard a fixed set/list of workforce attributes, and HR principles and practices (suitable for any dynamic organisations).

This research argues that in the context of hyper-competition, and environmental jolts where firms continually and rapidly have to reconfigure their business strategies and organisational arrangements, instead of a certain set of workforce attributes, a spectrum of workforce attributes are needed to respond to various business strategies and contexts that a firm may encounter one after each other. Accordingly, the renewal, evolution, and adaptation of HR systems (and the bundles of HR policies, programs, and practices) are becoming highly important to generate a wider range of workforce attributes and facilitate the implementation of a broader types of strategies.

In summary, this review indicated a number of inadequacies and shortcoming in HRM-agility theories and research as presented in the following eleven categories:

- 1- The field of strategic HRM has paid little attention to the concept of dynamic shifts, hyper-competition, environmental jolts and agility.
- 2- There is a lack of comprehensive perspective of SHRM paying attention to the dynamics of both the business environment and organisational agility related competencies.
- 3- There is a shortcoming in addressing the effect of external environment uncertainties and forces on the choices of HRM principles and practices.
- 4- The existing models of agility-oriented HR strategy (by Shafer et al., 2001; Dyer and Shafer, 1999, 2003; Dyer and Ericksen, 2006) only narrowly address the potential roles that HR can play in implementing agility strategies.
- 5- The proposed model by Dyer and Shafer (2003), adopted a middle ground between contingency and universalistic perspectives, offering a fixed list of HR practices and a HR strategy that is appropriate for dynamic organisations (DOs) in general. However, when performing under persistent uncertainty and continuously morphing conditions, adopting a relatively static and internally-focused HRS with a fixed list of HR practices is inadequate.
- 6- The previous models are based on rather static assumptions about the competitive environment and are limited in the consideration of dynamics and complexity of the necessary organisational capabilities and desired people competencies. Consequently, workforce agility attributes tend to be more of a fixed list of factors resulting in HR strategy becoming potentially static.
- 7- Very limited research empirically identified distinctive characteristics of agile workforce, so, as put by Dyer and Shafer (2003), the attributes of workforce, remained as the most *speculative* aspect of the HR-agility study. Moreover, the existing studies tend to ignore the dynamic and contextualised nature of agile workforce attributes.
- 8- Different authors have adopted different approaches regarding the conceptualisation of HR aspects of agility, resulting in a lack of unified approach about the level of analysis and an absence of an integrative and holistic perspective about agility-oriented HR strategy and its components.

- 9- None of the existing models has studied the characteristics and dimensions of HR function itself.
- 10- There is a lack of a clear definition of agile HRM, and comprehensive identification of its constructs and components
- 11- There is a lack of a comprehensive conceptual model of agile HRM which addresses both content and the process aspects of strategy making.

CHAPTER THREE

RESEARCH METHODOLOGY

3.1 Introduction

This chapter comprises five main sections. The first section (3.2) introduces the main steps of the research process as depicted in Figure 3.1. The second section (3.3) provides a brief overview of the tasks involved in step one of the research project including: reviewing the literature, building the theoretical and conceptual foundations for the research, defining aim and objectives, and developing the research questions.

The third section (3.4) outlines the research design and attempts to justify the two philosophical foundations of the research including: what is the nature of knowledge in this research (ontology, at section 3.4.1.1); what constitutes acceptable knowledge in this research and how the researcher has obtained this knowledge (epistemology, at section 3.4.1.2).

The third section also involves the sub-section (3.4.2) which outlines the chosen research method together with justifications for any decisions made at this stage- i.e. the processes and tools selected for collecting, organising and analysing data. Further insight about how companies and interviewees were chosen for the study and how the interviews were designed are given in this section.

The fourth section (3.5) explains the detailed data collection procedures undertaken by the researcher. The fifth section (3.6) briefly reviews different theoretical approaches to qualitative data analysis and then introduces and justifies the selected data analysis technique, template analysis (TA). The sub-section (3.6.2) illustrates how the TA approach has been applied in this research with the aid of the NVivo software package. Finally, the sub-section (3.6.2.7) introduces the quality assessment criteria selected and applied for this qualitative research.

3.2 The Research Process

This qualitative research is conducted in five main steps as depicted in Figure 3.1. It adopts the concept and model of ‘progressive focusing’ as presented by Sinkovics and Alfoldi (2012) based on the definition refined by Stake (1981; 1995). The progressive focusing model of the qualitative research process acknowledges messiness and complexity of the qualitative research process by designing the research in a way that allows constant

interaction between theory and data through an iterative, cyclical process of continual comparison of data with literature (Sinkovics and Alfoldi, 2012).

With its emphasis on the importance of conducting a literature review and developing research questions before starting field studies, researchers are required to systematically decrease the breadth of their focus and concentrate on the relevant emerging issues (Sinkovics and Alfoldi, 2012). The key aspect of the model is the tight linkage and iterations between the three stages of data collection, data analysis and literature review which is shown by thick red arrows linking the steps in Figure 3.1. The repetitions will continue until the theoretical and empirical analysis shows a degree of theoretical saturation (Glaser and Strauss, 1967; Strauss and Corbin, 1998) when the researcher was satisfied to move to Step 5: synthesising the arguments and contributions of the study.

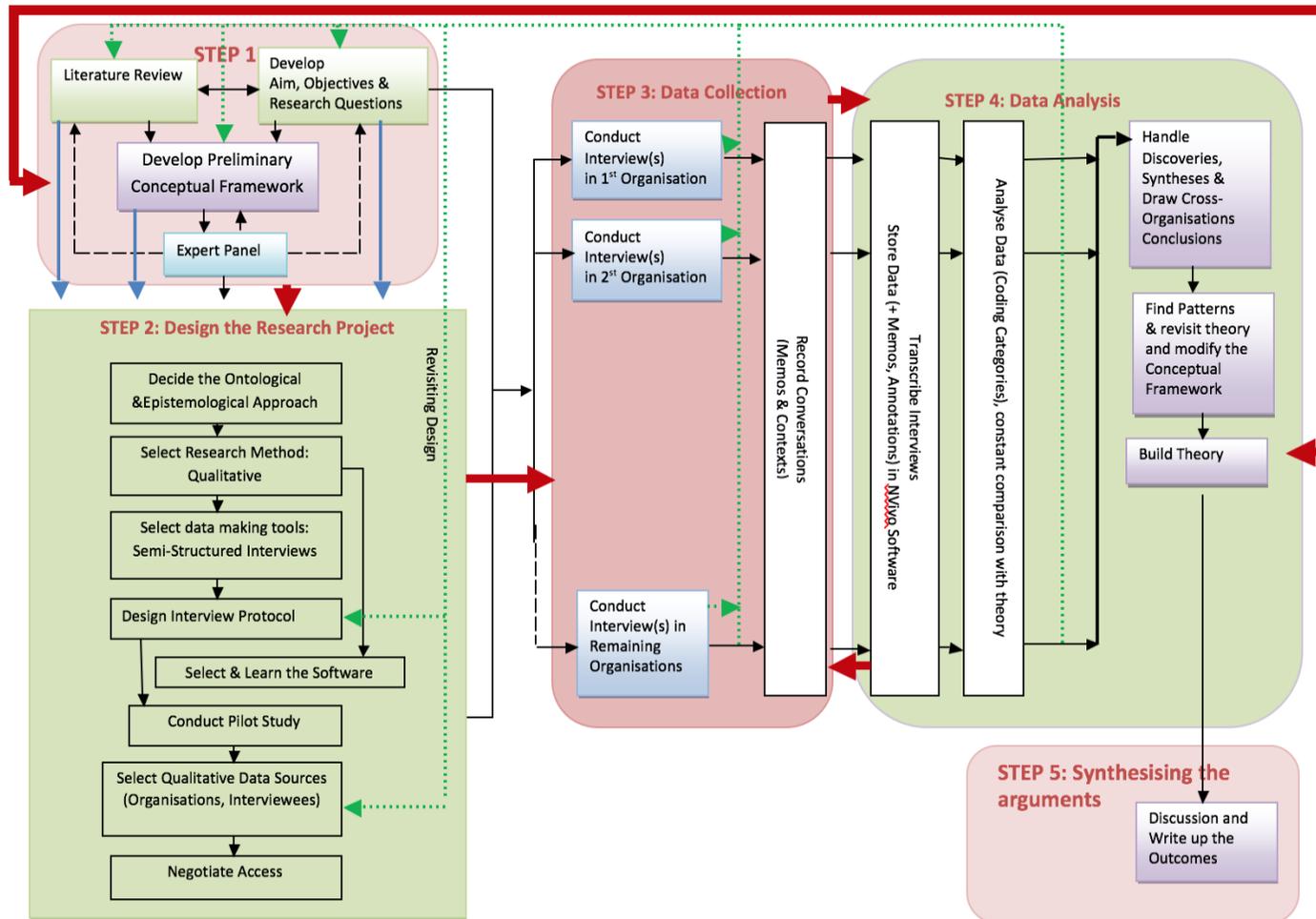


Figure 3.1. The research design based on the progressive focusing model, adopted from Sinkovics and Alfoldi (2012).

3.3 Review of the Literature, Development of the Conceptual Framework and Research Questions (Step 1)

The project commenced with a pre-fieldwork preparation phase that included steps 1 and 2 of the model shown in Figure 3.1. Step 1 started with a comprehensive review of theories of strategic management, organisational agility, operational agility, workforce agility and strategic HRM, aiming to explore the people aspects of organisational agility and the role of HR strategy in agility development. Resulting from the review, a preliminary conceptual framework has been developed based on the existing knowledge of the subject.

3.3.1. The role of literature and previous studies in the development of theory

Some advocates of traditional grounded theory (especially in the Strauss and Corbin, 1990 and Glaser, 1992 versions) believe that qualitative researchers should start with few predetermined thoughts, no prior theories or concepts. However, this research aimed to extend the previous theories of agile HRM developed mainly by Shafer and Dyer (Dyer and Shafer, 1998, 2003; Shafer et al., 2001; Dyer and Ericksen, 2006).

Therefore, the researcher considered the existing knowledge in order to build a theoretical and conceptual foundation for the research and to define research questions. While the primary goal of this qualitative research was to learn from the data, it did not incorporate a grounded theory strategy. Thus, developing a theoretical model of AOHRM grounded in data does not mean that the researcher had no prior knowledge of the subject under the study. Rather, she re-searched to discover what is yet unknown and what new ideas can be learned from participants.

Following a constructivist approach, where the emphasis is on the subjective interrelationship between the researcher and the participant in co-construction of meaning (Hayes and Oppenheim, 1997; Pidgeon and Henwood, 1997), it would be impossible to be a subjective part of the research endeavour without any prior knowledge about the topic to be studied. It is because; the researcher believes that starting with an empty mind is improbable as researchers cannot separate from their personal and professional backgrounds and theoretical knowledge obtained from literature. Constructing an understanding of situations from the perceptions of participants requires researchers to broaden their horizons before conducting interviews.

Similarly, Eisenhardt (1989) emphasises the importance of starting case studies with an initial definition of the research questions. He supports the view of Mintzberg (1979) who believes that a well-defined focus helps in collecting specific kinds of data systematically as it is very easy to become overwhelmed by the volume of data. However, starting the qualitative research with a conceptual framework does not necessarily lead to deduction or to checking the framework with data for the purpose of confirmation or disconfirmation.

In the same way, a preliminary conceptual framework of the key issues that relate to human elements of agility, agile people attributes and AOHR strategies was developed after a review of the literature and is presented in Chapter Two. The conceptual framework directed the determination of research questions and guided the research design and the remainder of the study. However, the developed conceptual framework did not prevent the researcher from being open to emergent issues and new dimensions from the field. Rather, it enabled the researcher to shed light on the way of understanding participants' experience. It also acted as a road map showing an overall direction for discovery of the phenomena under the study.

Furthermore, adopting the perspective of 'progressive focusing' (Sinkovics and Alfoldi, 2012), the preliminary conceptual framework has been modified and reshaped during this exploratory research from obtaining insights from each interview. Finally, based on the developed conceptual foundation and the identified gaps in the literature, five research questions were developed concerning the people aspects of organisational agility, with a particular focus on five constructs: the role of organisational culture, the attributes of agile people, the role of HRM in achieving agility, the characteristics of an agile HR function, and AOHR practices (See Chapter One).

3.3.2. The Expert Panel

Since the agility development projects in the UK were not documented at the early stage of this research, the researcher had limited knowledge about organisations attempting to enhance their agility. Therefore, it was decided to meet with agility experts at the Liverpool Agility Centre to obtain insight about organisations attempting to develop their agility. The panel was conducted in 17/09/2012, and consisted of three agility consultants/professionals, each with over 12 years' experience of consulting and researching in the field of agility. In addition, the expert panel gave an opportunity to

review the preliminary framework and to receive valuable inputs on the conceptualisation of workforce agility and the research design including the issue of selecting organisations for the study.

3.4 Research Design (Step 2)

This stage involved making a series of decisions to operationalise the research questions. These include:

- Decide the Ontological and Epistemological Approach
- Select Research Method
- Select data making tools
- Design Interview Protocol
- Select and Learn the Software
- Conduct Pilot Study
- Select Qualitative Data Sources (Organisations, Interviewees)
- Negotiate Access

Since the literature appeared as insufficient in answering the research issues, this study has adopted an exploratory approach. The following sections will explain the research methodology which comprises both the philosophical assumptions and methods selected and applied for data collection and analysis.

3.4.1 Research Philosophy and the Ontological and Epistemological Approach

Research philosophy as detailed by Saunders et al. (2009:107) includes significant assumptions about the way in which a researcher views the world and the development of knowledge and the nature of that knowledge. These philosophical assumptions, as highlighted by Cunliffe (2010), underpin the research strategy and any chosen methods for data collection and analysis, and the approach to theorising and the writing up of the research outcomes.

Research philosophy is often explained by two major terms: **ontology and epistemology**. **Ontology** is concerned with the nature of the phenomena, or entities, or the social “reality” that the research wishes to investigate (Mason, 2002). The two main identified aspects of ontology in the field of sociology are **objectivism and subjectivism** (Henwood and

Pidgeon, 1992) which both are accepted by many business and management researchers (Bryman, 2001). These approaches can be viewed as at opposite ends of the spectrum while many potential combinations of these two philosophically polarised positions are possible.

Objectivism views that reality is external, objective and independent of social actors (Saunders et al., 2009). So that, as noted by (Bryman, 2008), it advocates that the study of social reality can apply the methods of natural sciences which are concerned with collecting facts and data to test hypotheses and to confirm knowledge. In contrast, **subjectivism** portrays the position that social phenomena are created from the perceptions and actions of social actors. Therefore, the reality is socially constructed and subjective, this may change because it is in a constant state of revision and consequently is multiple (Bryman, 2001).

Epistemology is concerned with the philosophical position of how we come to know and what constitutes acceptable knowledge in a field of study. In particular, the epistemological stance clarifies whether social research can apply the same principles and processes as the natural sciences (Saunders et al., 2009; Bryman, 2008). For instance, positivism is closely related to the philosophical stance of the natural scientist. So, adopting this philosophy makes the epistemological assumption that ‘only observable phenomena’ can provide credible data and can be validly regarded as knowledge which is based on discovery, hypothesis, measurement, deduction and verification. Ontologically, positivists view the world as external and objective to the researcher who works with an observable social reality. Thus, it is highly concerned with the issues of causality, reliability, validity, replication and generalizability similar to those in the physical and natural sciences (Bryman, 2001).

In contrast, **Interpretivism** is a research philosophy that assumes that social reality is subjective and multiple and is influenced by social actors including the researchers and the context of the research (Collis and Hussey, 2009; Burrell and Morgan, 1979).

Interpretivism advocates that researchers need to ontologically appreciate the differences between researching humans as ‘social actors’ and other objects such as machines and computers as we interpret our social roles based on the meaning we give to these roles or we interpret the social roles of others based on our own set of meanings.

In other words, we are continually interpreting the social world surrounding us including the behaviours and actions of people we interact with every day and consequently we adjust our meanings and actions. This epistemological tenet rejects the notion of an objective reality. So, interpretive researchers make an effort to understand the meanings and constructions that people place on their experiences by applying reflexivity and sense making techniques rather than measurement and experimentation (Easterby-Smith *et al.*, 2008; Collis and Hussey, 2009; Haynes, 2012).

3.4.1.1 The Ontological Argument

While the **objectivist** approach and **positivism** has many applications in social science and has dominated organisational research (Duberley *et al.*, 2012), research questions require a different type of approach which is based on the definition and interpretation of ‘agility’ and ‘people management’ experienced by people rather than an objective measurement. The principal objectives of this research were to investigate the *desirable attributes of employees* in agile organisations, with particular concentration on *human resource management dimensions* required for organisational agility. The main phenomena under the study are as follows:

- **People**; their set of values and beliefs; their understandings of organisational culture, business goals and directions, and the changes happening around them; their reactions to changes and their behaviours in recovering from changes or adapting to a new environment; their attitudes towards a new way of working or adopting to new technology; the way they interact and collaborate with new people and teams in cross-functional projects, collaborative ventures with other companies or virtual organisation; their attitudes towards learning and applying new knowledge and skills; and in summary their mindset and behaviours and their skills repertoire.
- **Human Resource Management**; the contributions that people management strategies, systems, principles and practices can have in the achievement of organisational agility.

From the above attributes, it can be recognised that the research assumed that people have a significant role in achieving agility and that they are the main *subjects* in accomplishing agility objectives. One opposing way of conceptualising people in agile organisations is considering them as *objects* and that agility programmes are

forced upon them, so that they have to adjust themselves with new technologies or advanced manufacturing systems. The study of 'Human factors in agile manufacturing' conducted by Forsythe to some degree represents this alternative ontological perspective as he is more concerned with "elimination of human points of failure in infrastructure support" or "compatibility of corporate administrative system and infrastructure support structure" (Forsythe, 1997).

In fact, Forsythe's view of people's role in agile organisation mirrors the initial approach to agility following the introduction of the paradigm by the Iacocca Institute. According to Youndt et al. (1996), in the past, the dominant belief was that agility can be obtained by the application of sophisticated technologies such as computer-integrated manufacturing (CIM). So, the only few research which studied human factors, were concerned with information management and the utilisation and compatibility of *employees' knowledge and skills* with complex and dynamic manufacturing systems (Forsythe, 1997).

Therefore, ontologically, this research sees people in agile organisations as main players. They are minds not bodies, so that their thoughts, feelings, beliefs, understandings and interpretation of dynamic organisation are the main subjects of this research. In addition, from the three ontological levels of individual, group and organisational, this research studies people at the individual level.

Furthermore, HRM is a system designed and managed by HR or senior executives to manage 'people' and particularly in agile organisations to facilitate the development of organisational-specific agility capabilities and workforce competencies and attributes. Consequently, "developing" agile employees, involves internalising a new set of values and mindset as defined by HR or leaders. In this way, HRM is responsible for cultural transformation, and its principles and policies should result in changes in employees' mindsets and behaviours. While HRM policies can aim at "hard and measurable" results and setting rules and procedures, they can also concentrate on "soft" issues such as employee development, belief systems and social interactions.

The main quest of this research was to explore the bundle of HR principles and practices that can contribute to the development of agile attributes among employees. So, ontologically this research sees HRM system as a bundle of people management principles, policies and practices which can influence the way that individuals think,

behave and take actions in an organisation. In order to explore these bundles of policies and practice, information has been gathered from social actors- i.e. HR executives and senior managers who have been involved in agility change initiatives.

In other words, ontologically, this research's realities are multiple and socially constructed; therefore, the ontological position is anti-positivist, as it does not consider an objective world and an independency of reality from social actors. In the next section of epistemological argument, it will be explained how this ontological approach is more matched with qualitative research methodology than quantitative.

3.4.1.2 The Epistemological Argument

As mentioned in Chapter Two, the human side of organisational agility is a relatively new territory in research and demands a close interaction between researchers and practitioners in order to connect knowledge and actions and to generate theories from practices. Given the exploratory nature of this research, the research philosophy is predominantly congruent with the philosophy of **interpretivism**, since a fundamental aim was to explore 'how' HRM can create agility capabilities through people in organisations. Arguably, understanding the human issues surrounding the implementation of a 'culturally embedded' and 'value-based' organisational paradigm such as agility was less likely to be derived from an independent viewpoint using positivist assumptions.

It is because; obtaining rich insights into complex issues such as 'workforce agility' and 'agility-oriented people management' would not be possible by reducing such complexity to a series of quantifiable statements. In other words, generating 'understandings' and deep knowledge was more possible by concentrating on 'subjectivity' and individuals' viewpoints and seeking explanations rather than employing an epistemological perspective of presuming that everything is easily observable and measurable (Burrell and Morgan, 1979, Grix, 2004:83).

Furthermore, I as the researcher have seen myself as part of the data making process. As a result, each interview was a unique experience as I did not ask every interviewee exactly the same questions in exactly the same sequence and with exactly the same wording. Thus, while there were some similarities in the main areas of the questions, there was not a computer-like consistency in the structure of interviews as each interview informed the

next data making process. So, axiologically (Farquhar, 2012), instead of valuing views expressed in an anonymous questionnaire, I have valued personal interaction with participants.

Following the anti-positivist tradition for studying 'AOHRM' as a highly complex and revolutionary subject, the selection of a robust data collection method was critical to address the research questions. It was necessary to adopt a research strategy which was directly influenced by the selected ontological and epistemological positions and which allows the researcher to enter the organisations as social world of the research subjects and understand the participants' world and their unique and complex business situations from their perspectives.

3.4.2 Research Method: Selection and Justification of Data Collection and Analysis Methods

The review of SHRM research indicated a prevalence of survey approaches among the empirical works on strategic HRM (Harness, 2009). These studies have tended to collect factual, objective information. In the same vein, the dominant approach to studying workforce attitudes has been the use of quantitative methods and in particular the survey strategy (Anderson, 2009). Comparative qualitative case study research was used mainly when existing theory was underdeveloped (Eisenhardt, 1989).

Similarly, two of the previous studies of workforce agility, undertaken by Breu et al. (2002) and Sherehiy (2008), applied quantitative research methods. Breu et al. (2002) engaged 515 companies in the UK in a structured survey in order to define attributes of workforce agility. Applying a deductive approach to research, they indicated 10 variables drawn from agility literature as potential attributes of workforce agility. As some other attributes appeared later in other studies conducted by Shafer et al. (2001), their set of variables does not successfully represent a full conceptualisation of the subject. This limitation suggests a space for inductive research to identify further attributes and to formulate a strategic plan to achieve those attributes.

Accordingly, quantitative methods such as survey and experiments could not be an appropriate fit for this research. Since, existing knowledge about the phenomenon under the study is little (Strauss and Corbin, 1990; Eisenhardt, 1989), the quantitative approach

which mainly works with statistics for measurements and hypotheses testing (Bryman 1988) rather than generating rich and descriptive data, did not fit well with this research.

Therefore, in congruence with the employed philosophical stance of interpretivism, the research undertook an inductive approach in which qualitative data was made collectively by the researchers and interviewees and theory has developed as a result of the data analysis. As opposed to the deductive approach where the main aim is to deduct a hypothesis or a testable proposition from an existing theory, applying the inductive approach put the emphasis on understanding what was going on for people dimensions of agility and the context in which such agility developments were taking place in participating organisations (Ghauri and Gronhaug, 2005; Saunders et al, 2009).

Van Maanen (1979 cited Cassell and Symon 1994: p. 520) provides a definition for ‘qualitative methods’ as

“The label ‘qualitative methods’ has no precise meaning in any of the social sciences. It is at best an umbrella term covering an array of interpretive techniques which seek to describe, decode, translate and otherwise come to terms with the meaning, not the frequency, of certain more or less naturally occurring phenomena in the social world”

Qualitative methods were selected as an appropriate fit for this research since; firstly, they closely align with both the complex nature and the inductive theory-generation stage of ‘workforce agility’ and ‘AOHRM’ phenomenon which little is known about (Cassell and Symon, 1994). Secondly, they could provide the researcher with intricate details and an understanding of the meanings that interviewees would attach to their agility programmes and their implications for employees performing at those organisations. Thirdly, the possibility of close interactions with participants and hearing their stories of agility development within the organisational contexts would help to make better sense of collected information and data and generate a foundation for formulating a conceptual framework for AOHRM.

Assessing the research strategies appropriate for the inductive approach including action research, ethnography, case study and grounded theory, identified differences mainly in their approach to the way data is collected, analysed and interpreted. Furthermore, the appropriateness of these various strategies mainly depends on the research questions. For instance, action research, as a collaborative problem-solving method, is more suitable for a

particular situation that needs a specific knowledge about an ongoing system to solve a specific problem (Silverman, 2006). Thus, due to the misalignment between the purpose of this research and scopes of action research, this strategy was rejected.

Similarly, ethnography as a strategy, which is based upon direct observation as its primary source of information, demands a high level of involvement from researchers who need to immerse themselves in the lives of individuals under study and attempt to study the phenomenon in their cultural and social context (Gobo, 2011). Regardless of the issues of access to the research field, the considerable amount of time that was required to spend in the field to observe details and gather information did not match with the period of the registration of this PhD study.

Additionally, this research investigates human aspects of agility from various lenses including desired people attributes, supportive HR strategy and practices and suitable HR technology and functions. So, the main part of data had to be collected through interviews and the statements provided by participants during interviews, which cannot be considered as a suitable substitute for the observation of actual behaviours (Heritage, 1984 cited in Gobo, 2011). In other words, what this research was more interested in exploring were the opinions of HR leaders and senior managers who have been involved with agility development rather than what ethnography mainly observes i.e. behaviours, rituals or routines (Gobo, 2011). Therefore, ethnography was also excluded.

Furthermore, Dyer and Shafer in their seminal works on AOHR strategy conducted several numbers of exploratory case studies, semi-structured interviews and observations. What has been noticed in their studies was the fact that AOHRs has emerged over time to support the successful achievement of organisational agility rather than through a detailed planning. As part of their case studies, they had the opportunity to be present during the period of a two-year agility implementation and to collect data through first-hand observations of several events such as meetings and training sessions alongside their semi-structured interviews with key individuals.

A similar design could ideally be the most suitable strategy for this research. However, after negotiating with the participating organisations, it became clear that none of them had a live implementation to be observed by the researcher between the time-period planned

for data collection. Therefore, it was a sensible decision to spread the participants more widely and to rely on semi-structured interviews as the primary data collection method.

To further clarify, this research design is not a case study. It is an interview-based research, in which a multiple-organisation approach was adopted. The researcher took the opportunity to gather data from all of the organisations which met the selection criteria and agreed to participate in the research by conducting interviews and reviewing the documents they provided.

3.4.2.1 Data Collection Technique: Semi-Structured Interviews

Interview is selected and used as the primary data collection technique for creating qualitative data to record participants' experiences, insights and perceptions in relation to organisational agility and its implications for people. Documents such as internal presentations related to agility and annual reports were also used as sources of data where these were available and provided.

This research incorporated two types of interaction between the researcher and participants including: one-to-one, 'face to face' interviews, and one-to-one, telephone interviews. The majority of the interviews, 23 out of 30, were done in person while 7 interviews were conducted via telephone as preferred by the participants. The researcher also used focus group at the expert panel and the pilot study prior to the main data collection stage.

Among different types of interviews distinguished by Lindlof and Taylor (2002) including ethnographic, informant, respondent, narrative and focus group, the respondent interviews were conducted. So, participants were requested to share their own perspectives and experiences in relation to several research questions (Alvesson and Ashcraft, 2012).

Interviews can also be categorised into structured, semi-structured and unstructured or in-depth interviews based on the level of formality and structure. In structured interviews, researchers ask a 'standardised' or identical set of questions exactly as written in an interviewer-administered questionnaire in a way that does not indicate any bias (Ghauri and Gronhaug, 2005). Considering the cross section of organisations participating in this study, from different sectors and industries, each with very different perspectives, scope and dynamics of agility programme, applying a structured style would not shed light on the hidden issues of workforce agility.

Instead, a series of semi-structured interviews (Miles and Huberman, 1994) were conducted which granted a more exploratory style and flexible approach in the interviews. Therefore, a number of themes and questions were covered while the themes, numbers and the order of questions were varied in each interview due to the various range of organisational contexts and events that the research studied.

While the majority of the interviews were semi-structured, in a few cases, whereby the interviewees were very interested in the subject and had a wealth of knowledge and information to share, the 'in-depth' (unstructured) interviews approach (or informant interview) was adopted. In these cases, the main areas of questions had been sent to the interviewees prior to the meetings, but during the interviews, the interviewees had the freedom to direct the conversations and share their experience and knowledge in relation to the research questions (Easterby-Smith et al., 2008; Ghauri and Gronhaug, 2005). This design is in agreement with the views of Robson (2002) and Cooper and Schindler (2008) who argue that in an exploratory research, semi-structured and in-depth interviews are very helpful to discover what is happening and to obtain new insights.

In the context of this research, semi-structured and in-depth interviews provided a great opportunity to 'probe' answers and ask further questions where the researcher needed more explanations to understand the meanings of a phenomenon or where it was needed to discover the components of a strategy/practice or stages of an implementation. Agility especially, and its implication for employees had various meanings to each organisation. In particular, different organisations have focused on different combinations of agility capabilities, therefore the implications of their agility programmes for people were varied across organisations. So, the opportunity to ask the interviewees to provide further information added significance and depth to the research data.

In many cases, the interviewees stated that they were happy because of finding an opportunity to think about human issues in their agility programmes that they had not previously thought about or to reflect on their programmes from a new angle. The willingness and enthusiasm of these interviewees not only enriched the collected data, but also led to getting access to other organisations by building a network of professionals who work on agility or were interested to share their experience of an agility implementation.

3.4.2.2 Interview Protocol and Design

A great deal of careful thought went into designing the interview protocol (see Appendix B3). It concurs with the view of Yin (2003) suggesting the significance of a protocol in adding to the reliability of the data collection process and guiding the researcher in conducting the data collection. The insight from the existing literature, the preliminary conceptual framework and the determined research questions provided a foundation for the interview protocol.

The interview protocol consists of two main parts. Part 1 includes the questions and points which helped the researcher to collect information about the organisations' background and overviews of their agility programmes. The Part 2 of the protocol consists of five standard questions, focusing on the five research questions as outlined in Chapter one. These questions were the focus of the all interviews and were asked in all organisations.

The Part 2 also includes several questions which are pre-determined points of checks/aspects in relation to each of the five research questions. These additional points of check were noted to help the researcher to improve the flow of the conversations when necessary. They were also used as a guide to ask for further information and explanations, probe answers and add significance and depth to the research data. For instance, the interviewees were encouraged to provide information about ten areas of HR, as listed in the interview protocol (Appendix B3), when they were asked to answer the research question five (RQ5).

Overall, the protocol acted as a guide for the conversations as well as ensuring that all themes were covered rather than rigidly structured data gathering activities within the organisations. The list of questions was tested in the pilot focus group before being used in the actual data gathering activities.

Furthermore, the participants had been informed about the research aims and the main areas of questions before interviews. A letter of introduction /invitation containing background information about the research and rationale for selecting the organisations was sent to all interviewees who were subjects of the study. In addition, a document named 'Information for Research Participants' was sent to each interviewee prior to each interview (See Appendix B2). It includes an overview of the research project, its aim and

objectives, the research main definitions and propositions, data collection procedures including audio recording of interviews and confidentiality of data, and the main areas of interview questions.

Following the progressive focusing model, data collection, data analysis and the development of theories were considered as iterative and interrelated processes. Thus, data analysis took place during the collection of data immediately after each interview where this was possible (See Figure 3.1). As a result, the researcher had opportunities to revisit the interview protocols after each interview and to refine or add further questions to be addressed during the next interviews in the same organisation or the next interviews in other organisations.

Consequently, some new points of check were added to the interview protocol during the data collection stage inspired by the new constructs emerging from the data also by the newly identified areas of literature. These new points are identified in the interview protocol by a star * sign.

3.4.2.3 Rationale for the Selection of Participating Organisations

Dyer and Shafer (1998) argue ‘purposive sampling’ will be more conducive to learning about agility and HRM as opposed to convenience or random selection of case examples. They also suggest selecting from organisations which have achieved competitive advantage through organisational agility, are labour - rather than capital- intensive, are highly successful or quite unsuccessful (to learn from their failures), and are small or medium-sized.

The main criteria for selecting organisations for this research was selecting organisations which perform in a turbulent business environment where they have had to improve their responsiveness to change and to adopt an agility strategy to survive or thrive well. Based on the insights obtained from the literature and the expert panel as well as the experience acquired in the pilot focus group, the criteria for selecting participating organisations was determined in detail as follows:

- Large public and private sector organisations in the UK which perform in a turbulent and increasingly dynamic and changing business environment and that indicated concerns for improving their agility and responsiveness to change.

The reason for focusing on large organisations was that the insight from the expert panel and the recent literature, at the time of deciding which organisations to study, indicated that many of the large organisations had implemented an agility programme, or were concerned about increasing their organisational agility and promoting workforce agility. Interestingly, a report by CIPD (2014) revealed that the larger companies surveyed in their study were more concerned with agility and improving their responsiveness to change compared with SMEs. Furthermore, according to their report, public services organisations were ahead of the other sectors in being concerned with improving organisational responsiveness to change (CIPD, 2014). However, two medium size organisations were also studied as they have shown explicit indications of agility development in their organisations.

Turbulence in the business environment included factors shown in Table 3.1:

Table 3.1. Factors Indicating Turbulence in Business Environment

- | |
|---|
| <ul style="list-style-type: none"> • Increasingly changing customer requirements and expectations of customisation • Competition pressure to be first to market and need to adopt an agility strategy as a source for competitive advantages • Rapid technological changes affecting business models and operations/processes • Difficulty in increasing productivity • A range of new regulations and legislation affecting businesses in different ways • New range of social factors leading organisations to consider stakeholders' expectations such as increase in value placed on intangible assets including human capital, customer capital, social capital • Intense competition for talent and changing expectations of workforce |
|---|

- Organisations in which becoming agile had been an explicit strategic goal and where they initiated/implemented change initiatives towards achieving this goal.
- Organisations which had initiated or completed the implementation of a transformation programme or change initiatives which could lead to organisational or workforce agility, even if they do not call those programmes agility programmes.
- Given that the focus of the study is on workforce agility and AOHRM, organisations which have adopted a bundle of “people management practices” demonstrating indications of agility by their success and reputation in HRM were considered as the most suitable cases for this study

- Obviously, all organisations which had the above criteria needed to provide the researcher with access to key people in strategic HRM, Organisational Development (OD) or new product development and R&D, agility programme managers. The researcher needed to be provided with enough time to conduct the necessary number of interviews in each organisation.

After determining the criteria for the selection of the organisations, a list of 100 organisations were purposively selected from the Agile Future Forum and from the database Britain's Top Employers. The list also included organisations which were suggested by the Agility Centre as well as the organisations reported by the Consultancy Company 1 which implemented an agility programme. They were invited to participate in the research by emails and linked-in messages which achieved a response rate of 42 percent. The email responses were followed up by 5 to 10 minute telephone conversations in order to identify the best matched cases to the selection criteria. Eventually, 17 organisations which agreed to provide the necessary time and information were selected. These organisations that participated in the research were matched, as closely as possible to the selection criteria.

The selected organisations reported having implemented an agility programme which provides them with opportunities to improve flexibility and speed of their response to market change, as well as their ability to take advantage of change in both product/service and processes.

3.4.2.4 Rationale for the Selection of Interviewees

Forty people in total were interviewed during the expert panel, pilot focus group and thirty of them during main data collection stage. In some organisations, the research questions were answered by doing only one interview, but for 6 organisations, it was necessary to do further investigations by interviewing another person to fully answer the research questions. Tables 3.2 and 3.3 show information about interviewees at the expert panel and pilot focus group respectively. The breakdown of main interviews by organisations and positions is shown in Table 3.4. The main criterion behind the selection of interviewees was their ability to provide the research with information and knowledge that contributed to answering the research questions.

Therefore, this was not a random sample. On-going discussions with the supervisory team provided insight for narrowing the list of appropriate interviewees. In addition, conducting a focus group in the early stage of research with the purpose of gathering experts' opinions from agility professionals at the Liverpool Agility Centre provided a focus towards selecting appropriate organisations and knowledgeable interviewees within those organisations.

Given the focus of the research on the agile employees and HRM system as units of analysis, the selection in main data collection stage concentrated on senior-level managers and top human resource executives who have been involved in agility programmes and/or promoting AOHRM. It is because, they were expected to have a more comprehensive knowledge about the requirements of agility-oriented HRM and more extensive views of the strategic significance of the workforce agility than employees at lower levels.

The results obtained from the initial pilot study –focus group with seven HR professionals mainly at non-senior levels, supported this choice, as the interviewees did not provide the research with information about the strategic direction of their HRM and all existing agility-oriented HR principles and practices in their organisations. It also indicated the possibility of a lack of HR department involvement in agility programmes. So, it clarified that in organisations where the HR department has not participated in agility planning and implementation, interviews with non-HR managers who have engaged in agility implementation are essential. Similarly, Breu et al. targeted senior managers from UK private and public sector organisations when they conducted their survey about workforce agility (Breu et al., 2002).

After identifying organisations which were suitable for the study, Linked-in was used to identify potential interviewees by reviewing their experience and current roles and responsibilities. The potential interviewees were invited to participate in the research through linked-in messages and by sending a letter of introduction (See Appendix B1). Gaining access to interviewees and getting their confirmation of contribution engaged a great deal of attention and time (nearly two months).

In the early stage of the research, the main challenge was to decide the sufficient number of interviews and cases. However, following an inductive approach, the best time for stopping data gathering is the time when the required data for answering the research

questions is obtained. It is common in the qualitative research world to use the term 'saturation' for this stage of work.

Furthermore, based on the progressive focusing model, the data records and the categories (codes and patterns) emerging from data were constantly monitored during the data collection. This design provided the opportunity to investigate the new areas the data demanded. It is also in accordance with the requirements of 'theoretical sampling', "which refers to later sampling directed by the discoveries and concepts developed" (Richards, 2012: 563). Based on the theoretical sampling approach, reviewing and revisiting processes is happening until the categories become 'saturated' (Bryman and Burgess, 1994). Therefore, the data collection stopped when saturation happened- when the research arrived at a stage when nothing new was emerging (Richards, 2012).

Table 3.2. Analysis of Interviewees: Expert Panel

Organisation/Position	Senior Agility Researcher / Agility Consultant	Director / Agility Consultant	Marketing Manager & Analyst /Agility Consultant	Totals
Liverpool Agility Centre	1	1	1	3

Table 3.3. Analysis of Interviewees: Pilot Focus Group

Organisation/ Position	HR Adviser	HR Administrator	HR Assistant	HR Officer	People Development Officer	Leadership & Talent Manager	Totals
Birmingham City Council	1						1
NHS West Midlands	1					1	2
BCHC NHS Trust		1					1
West Midland Police					1		1
Cookson Precious Metals			1				1
Bromford Industries				1			1
Total							7

Table 3.4. Breakdown of the Main Interviews

		Organisations	No. of Intw.	Interviewees' Position	Documents / Archival Records
Local Councils and Housing Services	1	Council 1	5	Intw1. Senior HR manager Intw2. Senior HR Business Partner Intw3. Agile Working Sub Programme Manager Intw4. HR Professional Intw5. Safety Services Manager (middle manager)	Collected
	2	Council 2 (Housing Dep.)	2	Intw1. Learning and Development Manager Intw2. Environment Manager (Agile Working Programme Manager)	Collected
	3	Council 3 (Housing Dep.)	2	Intw1. (Agile Working) Programme Manager Intw2. Human Resources Officer	Collected
	4	Council 4	1	Organisational Development (OD) Business partner	
	5	Council 5	1	HR Manager	
Service Companies	6	Company 1 (Telecom)	2	Intw1. Senior Strategy Manager Intw1. Business Director & Flexible Working manager	Collected
	7	Company 2 (Banking)	2	Intw1. Head of Intelligent Working Intw2. HR leader : Cultural Transformation Lead, Agile Working Manager	Collected
	8	Company 3 (Multi-Businesses)	1	Head of Business Change and Transformation	
	9	Company 4 (Real Estate)	1	Strategic Consultant: Partner Global Business Consulting EMEA	
	10	Company 5 (Utilities)	1	Workplace Manager	
	11	Company 6 (Law)	1	Senior Director : IS and Operations Director/Partner	
Manufacturing Companies	12	Company 7 (Instruments Manufacturer)	2	Intw1. Senior Director of Informatics - Instrument Platforms Intw2. Human Resources Director	
	13	Company 8 (Aerospace)	1	NPI Technical Lead	Collected
	14	Company 9 (Automotive)	1	Human Resources Manager	
	15	Company 10 (Food)	1	Head of Talent Management	
	16	Company 11 (Medical Technologies)	1	Process Improvement Leader: agile project leader	
	17	Company 12 (Electrical Manufacturer)	1	Managing Director	
		Total :17 Organisations	26	Initial 17 Interviews + further 9 interviews= total 26 interviews	
Agility Consultants	18	Consultancy Company 1	1	MD/Agility consultant	
	19	Consultancy Company 2	1	Founder of the company/ Agility consultant	
	20	Consultancy Company 3	1	Agility consultant	
	21	Consultancy Company 4	1	Business Owner & Agility consultant	
		Total Interviews	30		

3.5 Data Collection (Step 3)

3.5.1 The Active Role of the Researcher in the Data “Making” Process and Co-Construction of Meaning

Epistemologically, constructivism requires researchers in their “humanness” to be actively and deeply embedded in the account being produced rather than objective observers (Guba and Lincoln, 1989). Accordingly, interpretivism demands the researchers to acknowledge their effect on those being studied. Hammersley and Atkinson (1983:18) support this view by suggesting that the researcher is the research instrument. “The fact that behaviour and attitudes are often not stable across contexts, and that the researcher may play an important part in shaping the context becomes central to the analysis.”

In this research, this has happened through an inductive process of data collection, in which the researcher has made no attempts to prove or disprove the original conceptual framework. Rather, important issues of ‘workforce agility’ and ‘agile HRM’ (to participants) emerged from the explanations or stories that they told in response to questions asked by the researcher. While acquiring qualitative data can seem easy, it was very challenging to direct the conversations (without reducing flexibility and openness) in such a way to acquire only the sufficiently rich data required to answer the research questions and to produce a new understanding of ‘workforce agility’ and ‘AOHRM’.

In that sense, it is appropriate in the context of quantitative research to use the term ‘collecting’ data since quantitative researchers seek for associations, groupings and patterns while working with numbers. They are undeniably collecting items that will be numerically represented, whereas, qualitative researchers often refrain from using the term ‘collecting’ as it implies that data are ready to be swept into heaps like autumn leaves. Richards (2012) suggests the term data ‘making’.

The researcher had to imagine participants’ positions and find appropriate language and dialogue and frame her questions appropriately to make it easy for them to explain how they see things and how they experienced agility development and its impact on people and HRM. It was an extraordinarily challenging task. It involved creating the appropriate situations for participants to freely explain what is really going on in relation to the implications of their agility programme for people.

The learning outcome from the pilot study and the first interview helped the researcher to understand the importance of language and setting and their effects on what participants see and feel and share in conversations. It was discovered that similar to everyday situations, to explore someone else's experience or to understand what's really going on in a new situation, confronting participants with prepared lists of questions would not work.

In order to enable free-flowing conversations and encourage the interviewees to share their understanding of the subjects, a great deal of sensitivity and consideration applied to the ways in which the interview process shaped the data made. It involved reflecting on the interview process both before and after each interview. Prior to each interview, the researcher thought of what she need to ask from the interviewees and what she would be doing for the interviewees to assist them in naturally conveying their views. So, no rigidly structured list of questions has been used. Instead, the interview protocol was used as a checklist of main issues to be discussed.

In addition, in order to earn their trust and interest, the participants needed to know about the research. This was explained to them in two steps; they received all information about the research purpose, outcomes and process of their contributions in a written format which was given to them along with a consent form for them to sign. The researcher also had a brief conversation over the phone (between 5-10 min) with all participants prior to the actual interviews discussing the above issues as well as arranging the interview dates and settings.

To sum up, the interview process created interactive relationships by which understanding, data making, sense making of data and construction of meanings happened collaboratively by the researcher and participants, through a reflexive process. I acknowledge my own pre-understanding of the subject from literature which I read along the journey and from my exposure to expanding data from each organisation and their impact on the process of making sense of the experience of the participants and learning from them.

Another challenge faced was the process of turning recorded 'information' to 'research data'. This research qualitative data consisted of records of interviews, interactions with participants and their explanations and the documents collected from some of the organisations. This information was complex and contextual and was expanded upon very quickly. Reflecting on the data records such as writing memos and annotations, generated

even more data and led to the expansion of data in unpredictable ways. So, handling this huge body of information and turning them into the relevant data was not an easy task. The next section explains how the complex process of handling this huge body of textual data was facilitated by using a computer aided qualitative data analysis software - the NVivo software.

3.5.2 Storing the Data

In total, 30 interviews were conducted in the main data collection stage, in the UK, between March and November 2013. Interviews lasted between 45 and 135 minutes, with an average of 73 minutes. All interviews were recorded by audio-recording the conversations. In total, 36 hours and 44 minutes of interviewing were recorded, resulting in approximately 263,452 words of transcripts.

The qualitative data analysis software package, QSR-NVivo 10, was used to facilitate the key processes of data collection, analysis of data, and the development of theory. It was attempted to store and analyse data in the Nvivo software as soon as data arrived from each interview. So, the majority of interviews were transcribed soon after each interview. When it was impossible because of tight schedules, a summary of records including a brief summary of findings from each participating organisation was produced and these were kept in the research diary. In addition, supporting notes of the main issues raised during the interviews were also made. This combination provided the opportunity to record major themes and points that emerged for later analysis and theory development.

As suggested by Richards (2012), the sooner data is recorded; the better insights from one interview can inform the researcher approach to the next data making processes. It also helped to evaluate data as they were expanding. So, applying this approach has helped to use the software search tools to assess the data content and evaluate whether the interview questions need rewording or not. For instance, the researcher changed the sequence of questions after three interviews and realised that the definition of agility should be discussed with participants in the initial conversations before the main data making interviews.

3.6 Data Analysis (Step 4)

According to Marshall and Rossman (1995:111), “data analysis is the process of bringing order, structure and meaning to the mass of collected data”. As stated by Saunders et al. (2009), the approaches to qualitative data analysis can be categorised into two main approaches: deductive and inductive approach. Researchers, who apply a deductive approach, use existing theory to formulate a theoretical framework which mainly directs the research process and data analysis. Alternatively, an inductive approach actively avoids existing theories and starts from data to develop a theory that is grounded in the data (e.g. Glaser and Strauss, 1967; Strauss and Corbin, 1990). This classification is similar to King’s (2012) categorisation of thematic analysis into ‘top down’ and ‘bottom up’ approaches.

Qualitative analysis procedures such as pattern matching (Saunders et al., 2009; Yin, 2009), matrix analysis (Nadin and Cassell, 2004), explanation building (Saunders et al., 2009; Yin, 2009), and framework analysis (Pope et al., 2000) follow a deductively-based or top down approach. By contrast, analytical procedures such as data display and analysis (Miles and Huberman, 1994), template analysis (King, 2004 and 2012), interpretative phenomenological analysis (IPA) (Smith et al., 2009), grounded theory (Strauss and Corbin, 1990 and 1998), analytic induction (Johnson, 2004), discourse analysis (Phillips and Hardy, 2002) and narrative analysis (Gabriel and Griffiths, 2004) adopt an inductively-based or a bottom up approach.

Incorporating an inductive approach, this research aimed to develop a theoretical model of AOHRM grounded in data collected from interviews. However, the existing theories and body of knowledge were used as a background for developing a preliminary conceptual framework to guide the study (Mason, 2002). Similarly, Yin (1994, 2003, 2010) argues that although a research study may adopt an inductive approach, starting the analysis from a theoretical perspective can bring some advantages including facilitating the analysis process by providing the researcher with an initial analytical framework and linking the research to the existing body of knowledge.

Therefore, a data analysis procedure was needed which firstly fits well with the epistemological position of the research, secondly which allows theories to be developed inductively from the data, permits existing theoretical knowledge and framework to be

applied as an initial analytical framework and priori themes to commence the analysis. Thirdly, it concurs with the progressive focusing model of the research design, which considers data collection, data analysis and the development of theories as iterative and interrelated processes (concur with the view of Lempp and Kingsley (2007)), thus allowing the cyclical process of going back and forth between the theoretical framework of the research and the emergent themes coming from data.

Finally, it allows data analysis to take place during the collection of data as well as after it (See Figure 3.1). In this way, themes, patterns and relationships could be recognised as early as the researcher was collecting data. The key criterion was to select an approach that permits the necessary flexibility that the researcher required.

Considering the above criteria, after reviewing the available approaches that can be utilised for qualitative data analysis, it was decided to use the template analysis (TA) technique along with the application of NVivo software to facilitate the process. In this section, firstly, the approach and its advantages over other qualitative data analysis approaches will be described to justify this choice. Then the steps involved in applying it for the analysis of data will be explained.

3.6.1 Template Analysis and Its Key Features

According to King (2012), template analysis (TA) is a specific technique of thematically analysing qualitative data rather than a methodology, which can be applied within a range of philosophical positions such as positivist quantitative research as well as research with a 'contextual constructivist' position. He states that TA has become a widely applied technique in a varying range of research areas especially organisational and business and management research. He argues that the main reasons behind its popularity are the clarity and structure of the technique, which make it easy to be understood and applied by inexperienced qualitative researchers, in addition to the flexibility to modify and adapt it to the specific needs of any study (King, 2012). Due to the same reasons, template analysis appeared to be the most suitable approach in this research.

In addition, the principles behind template analysis match perfectly with epistemological assumptions of this interpretive qualitative research. It is because, according to Saunders et al. (2009), template analysis can combine both inductive and deductive approaches to

analyse qualitative data as it allows themes and codes to be pre-defined in advance and then redefined, modified, added to or discarded as data are collected and analysed. This combination can locate TA in the middle ground between top down and bottom up approaches of qualitative analysis (King, 2012), which is the position that was required in this research.

King (2004) introduces three main features of TA which differentiate it from other procedures that resemble it, such as grounded theory and interpretative phenomenological analysis (IPA): the flexibility of the coding structure, the use of a priori themes, and the use of the initial template. These characteristics were the main reason behind selecting TA as the data analysis approach for this research.

3.6.1.1. Flexibility of the Coding Structure

King (2012) argues that template analysis provides a more flexible way to analyse in comparison with other approaches. For instance, grounded theory is much more prescriptive as it comes with too many structures and procedures for data collection, coding and analysis which restrict analysts (Corbin and Strauss, 2008). By assuming a clear distinction between descriptive and interpretive coding, it insists on a restricted number of levels of coding hierarchy which requires analysts to start from descriptive themes that are more concrete and data-grounded (open coding), moving to a smaller number of interpretive themes (axial coding) and then feeding them into a few major core categories (selective coding) (King, 2012; Strauss and Corbin, 1990) (See table 3.5)

Table 3.5: Three levels of coding in grounded theory

<p>Strauss and Corbin (1990) identify three levels of coding relating to different points of categorisation in grounded theory: open coding, axial coding and selective coding.</p> <p>Open coding- or ‘initial coding’ as described by Charmaz (1983)- “the process of breaking down, examining, comparing, conceptualizing, and categorizing data” (Strauss and Corbin, 1990:61);</p> <p>Axial coding- “a set of procedures whereby data are put back together in new ways after open coding, by making connections between categories” (Strauss and Corbin, 1990:96).</p> <p>Selective coding- “the procedure of selecting the core category, systematically relating it to other categories, validating those relationships, and filling in categories that need further refinement and development” (Strauss and Corbin, 1990:116)</p>
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By contrast, template analysis is a more flexible technique as firstly, it does not assume an explicit distinction between descriptive and interpretive coding, secondly it does not restrict researchers to a three-level coding hierarchy, instead it encourages them to identify themes and to develop categories more extensively and to explore the greatest depth of analysis as long as rich data are found (King, 2012).

3.6.1.2 Use of a Priori Themes

As template analysis can combine the top down and bottom up approaches of analysis, researchers are permitted to determine a limited number of themes which relate to the main components and theoretical issues of the research. These priori themes can be applied provisionally as the means to commence and guide the analysis which may need to be redefined or removed (King, 2012).

3.6.1.3 Use of the Initial Template

Another advantage of template analysis is the application of the initial template. Unlike other thematic approaches of analysis such as IPA which require the researcher to analyse individual cases/ transcripts in search of preliminary codes before synthesising categories across all cases, the creation of the initial template in template analysis is based on a subset of the data and the iterative process of applying it, modifying and re-applying can make the approach less time-consuming and more efficient and systematic for the researcher (King, 2012).

3.6.2. The Stages of Analytical Process Applying TA Approach with the Aid of NVivo

This section illustrates how the TA approach has been applied in this research following the steps suggested by King (2014):

3.6.2.1. Defining a Priori Themes

A priori themes are defined based on the existing theories and the preliminary conceptual framework developed before field studies. To construct a priori themes, the main components and issues in relation to the research aims and questions were extracted from existing literature and summarised (see Table B5.1 in Appendix B5). It was only as a tentative means to commence and direct the analysis. The table lists the first level a priori themes and second level a priori subthemes in the context of each of the five research questions.

3.6.2.2. Transcribing the Interviews and Familiarisation with the Data

The analysis process started soon after finishing the interviews at the first participating organisation, Council 1. All five conducted interviews were transcribed and the word-processed documents imported into the project file in NVivo along with all collected documents and visual data such as mind-maps and memos produced by the researcher. The process of familiarisation with the data took place by carefully listening to the recordings and reading through the transcriptions while highlighting and making notes of new emerging themes and any occurring relevance to the research questions and a priori themes. This process has been repeated for all interviews and transcripts after stage 4.

3.6.2.3. Initial Coding of the Data and Generation of the Preliminary Codes

According to Ghauri and Gronhaug (2005: 208) “coding is an important first step in arriving at understanding and generating theory.” They consider coding as the process of categorising data which is a device to “label, separate, compile and organise data.” (Ghauri and Gronhaug, 2005: 208). ‘Codes’ are described by Charmaz (1983:112) as devices to “summarise, synthesise, and sort many observations made out of the data”.

Table 3.6 presents the definitions that have been adopted in this research from King (2012: 430-431) for two terms of ‘theme’ and ‘coding’:

Table 3.6: Definitions of ‘theme’ and ‘coding’

<p>Themes: are “the recurrent and distinctive features of participants’ accounts that characterise perceptions and/ or experiences, seen by the researcher as relevant to the research question of a particular study” (King, 2012: 430-431)</p> <p>Coding: “is the process of attaching a label (code) to a section of text to index it as relating to a theme.” (King, 2012: 431)</p>
<p>King (2012:431) highlighted some important characteristics about themes:</p> <p>First: “The term ‘theme’ implies repetition. It should not be applied to a single isolated instance where a view is expressed or an experience described. While themes are usually identified across several cases, something important that is identified several times within a single case could still be defined as a theme. Second, “Themes are not objective ‘facts’ and are not independent of the researcher who defines them.” Third, “themes must be relatively distinct from each other. Some overlap is inevitable, but an extensive blurring of boundaries between themes is to be avoided.”</p>

This step involved reading all of the five transcripts and provided documents line by line and assigning preliminary codes to the sections of text wherever any segment of the discussions seemed to associate with relevant issues of the research. This was done by the

aid of NVivo in which different segments of the transcripts and other textual data including provided documents were attached to initial codes and stored in free nodes-containers of the coded data in the NVivo software. In this stage, the names used for categories were kept close to the language used by participants.

At the same time, the developed a priori themes were also kept available, so wherever a part of the transcripts appeared that could be encapsulated by one of the a priori themes, the pre-defined code was attached to the identified section. Therefore, it can be argued that a combination of inductive and deductive thematic analysis (or top down and bottom up approaches) has been applied from the very early stage of the analysis.

Application of Nvivo facilitates the iterative process of editing the inductively defined preliminary codes, modifying existing priori themes (pre-defined codes) as well as developing new themes. All priori identified themes, modified themes and new 'in vivo' emergent themes from data were initially stored as free nodes in the NVivo software.

Table B5.2 in Appendix B5 shows the preliminary codes generated from analysing data from Council 1 and compare them with the a priori themes. This version consists of codes which mainly derived from data, and includes background information about the Council such as their transformation programme, an overview about the change in their people management, and focuses primarily on the constructs of agility, agility drivers, organisational culture, new HR interventions, emergent HR practices, and agile working practice.

3.6.2.4. Producing Initial Template

In the next part of analysis, the hierarchical mechanism of the software was used to group, divide and subdivide the identified categories into meaningful groups of codes within which relationships between coded data were clearer. This led to the production of an initial template.

The initial template (Table B5.3 in Appendix B5) was developed after completing initial coding on data from the first organisation. To produce the initial template, the identified themes/categories named as preliminary codes in table B5.2 - (free nodes) were grouped into a smaller number of higher-level codes which represent broader themes. The titles of the higher-order codes were kept closer to the terms used in existing literature and a priori

themes, while the terms utilised for lower-level codes were based on the terms used by participants (in vivo coding).

Once different levels of hierarchy were developed, the segments of data which were stored in free nodes were moved into tree nodes in NVivo. After a long process of attempting various versions of the arrangement, the initial template was produced (See table B5.3 in Appendix B5). Examples of the changes in the preliminary codes and new arrangements in the initial codes can be found in table B5.5 in Appendix B5, in which the preliminary codes and the initial codes were compared for each research topics/questions.

For instance, the preliminary categories identified for “Characteristics of agile organisational culture”, were grouped into three higher-level codes, including 3.2.1.Employer-employee relationships, 3.2.2.Power sharing and 3.2.3.Shared values. Each of these codes are related to a number of lower-level codes as listed in the table.

Some of the priori themes (including reward and recognition, employee communication, employee/labour relations, and employee involvement practices) which did not emerge as preliminary codes at the first organisation were still included in the initial template. Moreover, there were a number of preliminary themes relevant to the concept of ‘agile working’ that could not match with any of the priori themes, but were raised widely by participants as important issues. So, at this stage, they were left under a higher-order code named ‘Agile Working Framework’.

3.6.2.5. Modifying the Initial Template

After constructing the initial template, it was applied to all the interviews transcripts and collected documents as soon as data arrived from each interview. So, after transcribing and familiarisation with data from each organisation, identifying themes and coding of the textual data was done by the aid of the initial template. In the course of this, different kinds of modification were made to the initial template. Table B5.6 in Appendix B5 compares the initial and final codes in the initial and final templates.

Table 3.7 provides a closer look to the changes in the categories and shows how initial codes have been modified to final codes for “Characteristics of agile organisational culture”

Table 3.7. Characteristics of Organisational Culture Critical for Agility: Closer look to the way categories were modified

	Initial template	Final Template
Modified (merged and/or renamed)	Employer-employee relationships: <ul style="list-style-type: none"> - Do not operate by fear - Listening to employees - Empowering people - Managers as coach and facilitator - Removal of bureaucracy - Distributed leadership: moving away from hierarchical way of operating - Fostering interdependence 	<ul style="list-style-type: none"> - Empowerment - Leading by example - Openness and honesty
	Respect and leveraging diversity	Diversity
	Continuous learning and innovating	Being innovative Desire to continuously improve
	Building “relationship power” and networked teams	Teamwork
	Utilising creativity and ideas of individuals	Creativity
	Collaboration	Collaboration
	Open communications Sharing information	Open communication environment
	Engagement and Commitment	Accountability
Removed Categories:	<ul style="list-style-type: none"> - Aligning with vision and strategy - Focus on Excellent practice 	
New Emergent Categories:		<ul style="list-style-type: none"> - Trust - Recognising the contribution of people - Being change ready and responsive - Customer focus - Flexibility - Risk-taking - Fairness - Integrity - Fast response - Thinking long term

Moreover, new higher-order as well as lower-order codes were added whenever relevant issues to the research's aims, objectives and questions were identified in the data, but could not be covered by any theme on the template. These new codes are recorded in *Italic format* in the final template in table B5.6.

As the data collection and analysis progressed, a number of codes were removed from the template as the issues raised by participants did not shed any light on the understanding of focal themes in the study, so were considered as irrelevant to the research questions and the study's aim. For instance, it was decided to remove four higher-level codes regarding Agile working framework and the large number of its related lower-level codes. This category was relocated as a lower-level code branching from work design practices, instead of assigning a higher-level code to it.

However, some themes that were evaluated as having marginal relevance to the research questions have led to adding new constructs to the background detail of the study (e.g. talent retention, HR structure and model, workforce data and analytic).

In addition, there have been some alterations in the level and place of existing codes in the template. For instance, a number of the top-level categories were divided into lower-level themes, and some of the lower-level themes were reclassified to higher-level codes, and some of them were merged together as they encapsulate similar issues. Several examples of these alterations can be found in Table B5.6.

The template was modified until all of the data was collected, coded and analysed using NVivo. As the template developed and modified, any changes in the codes such as shifts in the meaning, level and place of the codes and the reasons for those changes were recorded in memos. As part of this, the updated meanings and connections between emerging themes were recorded in the research diary.

The researcher frequently browsed categories to examine frequencies of themes and the patterns of their distribution within and across the transcripts. This helped to reflect on the concept and context of each category as well as exploring and comparing the importance of the issues across different organisations and sectors. This also helped the researcher to understand when the categories reached the point of saturation. So, instead of collecting the same data based on the same questions and accumulating data on one category, the

focus was shifted to exploring the emerging categories in more depth. Reports of these reflections were also kept in the research diary.

3.6.2.6. Using the Final Template for Interpreting and Writing Up the Findings (Step 5)

The final template (see Table B5.4 in Appendix B5) and all memos and research diary notes were used as a tool for making an interpretation of the data. Although the final template was not considered as the end product of the analysis, the hierarchical categories developed by the aid of the template were treated as the growing conceptual structure of the study, not just filing cabinets. Organising data in a hierarchical structure (tree nodes in NVivo) not only helped the researcher to see the whole data in a logically linked set of categories, but also stimulated analysis beyond the immediate categories. The tree nodes facilitated identification of the main dimensions of the study and therefore provided answers to the majority of the research questions.

In order to explore the relationships between those dimensions and to accordingly modify the theoretical framework of the research, the researcher conducted several searches to discover how categories in different trees are related. NVivo made this task easier as it provides the ability to run different kinds of queries such as searches of coding and discovering and testing relationships between categories by asking about the data coded at each. For instance, it was discovered that some of the principles related to the work design and staffing practices were also manifested in the talent retention. This led to a discovery about the importance of links and integration between all HR activities which are reflected in the discussion chapter.

Another method used to interpret the categorised data was comparing the frequencies of themes and assessing the patterns of their distribution within and across the transcripts by the aid of NVivo. This provided useful insight about differences between the opinions and experiences of participants and the applied practices across different organisations and sectors. However, in contrast with a positivist way of interpretation, the frequencies of themes were not merely assumed as indicators of their importance. Instead, as suggested by King (2012), they were considered as warning tools to do a closer examination of themes in the context of individual organisations' and interviewees' accounts.

Considering the large number of themes identified in the final template, the interpretation stage also involved being selective in deciding which themes are more important to focus upon. As mentioned above, this selection was not solely based on frequency; rather the most important themes were selected based on how each theme could provide an understanding of the topic under investigation and enhance the contribution of the study.

Integration was the final step to build theory which included the mapping of all identified interactions and relationships between categories, contexts and conceptual elements. At this stage, discoveries from different organisations were synthesised and integrated to build the research theory.

The use of the NVivo software package helped to do the above operations in a systematic way. It facilitated the continuous comparison of data and emerging conceptualisation with the preliminary framework throughout the data collection and analysis process. The researcher moved back and forth between data collection and the analysis stages and between the emerging framework and evidence. In doing so, some elements identified by the literature were grounded in evidence. However, some elements could not be retained and some others were modified to conform to the evidence. This systematic comparison stimulated an exhaustive analysis and reduced the risk of selective use of data.

3.6.2.6.1. Selecting a Structure for Presenting Findings

It was decided to present the research findings in separate chapters from the discussion chapter. Therefore, every interpretation and opinion of the researcher on the findings will be discussed in the discussion chapter. It was also decided to structure the finding chapters based on the research questions. This appeared as the most reasonable order, as it makes it easier to communicate findings associated with each research question to the readers.

In addition, the findings associated with each research question are reported thematically. So, the findings are structured based on the main themes identified in the data. In order to avoid losing the perspectives of individual organisations, illustrative instances from different organisations are provided in the form of direct quotes from the interviewees.

3.6.2.7. Quality Evaluation

Among a number of assessment criteria listed for qualitative research, the earliest and best-known list of criteria is formulated by Guba and Lincoln (1989). By recognising that positivist criteria that are commonly used in quantitative research are inappropriate for judging the quality of qualitative research, they devised a list of alternative criteria for a constructivist epistemology which is presented in Table 3.71 (Symon and Cassell, 2012).

Table 3.8: Guba and Lincoln’s (1989) Parallel Quality Criteria, Adapted from Symon and Cassell (2012:206)

Positivist Criteria	Interpretivist Criteria
Internal validity	Credibility
Generalisability	Transferability
Reliability	Dependability
Objectivity	Confirmability

Tracy (2010) identified a number of ‘universal’ criteria for the assessment of qualitative research that can be considered for all qualitative research despite paradigmatic and methodological differences. These criteria, which have general applicability, include: worthy topic, rich rigour, sincerity, credibility, resonance, ethical, significant contribution and meaningful coherence. In contrast, some other researchers such as Johnson et al. (2006) argue that the criteria should be paradigm specific. Therefore, they developed different sets of assessment criteria for four epistemologically different research paradigms of positivism, interpretivism, critical theory, and postmodernism (Symon and Cassell, 2012). Table 3.8 shows the criteria suggested for interpretivism research paradigm:

Table 3.9: Johnson et al.’s (2006) contingent criteriology for interpretivism paradigm, extracted from Symon and Cassell (2012:211)

Epistemology	Assessment Criteria	Questions to ask
Interpretivism	Internally reflexive audit trail demonstrating <ul style="list-style-type: none"> • Credibility • Dependability • Confirmability • Ecological Validity • Transferability/logical inference 	Is evidence provided that this is an authentic representation of what happened? Are the findings free from the researcher bias, and effects of bias minimised or otherwise accounted for? Have alternative explanations been considered and negative cases analysed? Do the findings speak to real life events and contexts? Has the extent of the finding’s applicability elsewhere been considered and is this feasible?

Given that qualitative researchers appeared to not have a shared view on assessment criteria (Symon and Cassell, 2012), some commentators such as Easterby-Smith et al. (2008) argue against detailed lists of criteria. It is because, they believe such lists are too constraining for qualitative researchers’ practice as they limit flexibility, subjectivity and relativity which are the main characteristics of qualitative research. Consequently, Symon

and Cassell (2012) recommend that qualitative researchers should only consider and apply those criteria of quality that are most relevant to their own research aims and explicitly demonstrate how they fulfilled those criteria in their practice. After reviewing existing assessment criteria, the rigour or trustworthiness of the current research is assessed using the following criteria: credibility, transferability, dependability and confirmability.

Credibility refers to best match between interpretation and reality and the extent to which findings are convincing and concur with the evidence (Finlay, 2006; Symon and Cassell, 2012). It can be achieved through using multiple sources and methods, prolonged engagement with participants, peer debriefing, progressive subjectivity, participants' feedback and validation, and negative case analysis.

In order to enhance the credibility of this research, the researcher spent a considerable amount of time with each participant to achieve an in-depth understanding of the phenomena under the study. In addition, the participant validation technique (Murphy and Yelder, 2010) was used as a way to receive respondents' feedback on the findings wherever it was possible to revisit them. Obviously, not all participants were available for another call, and not all identified themes were familiar for all of the participants as every organisation provided insights only on particular issues which were relevant to their context.

However, a number of enthusiastic participants provided significant support by attending a discussion meeting at the university with the researcher and the supervisory team. This was a great opportunity to present the research findings to them and check whether their experience and opinions on the issues are accurately captured and if the findings from other organisations can be meaningful and applicable to them. Reflecting on the insights received from participants, some minor changes were applied in the interpretation of findings. This assents with the view of Graneheim and Lundman (2004) who believe that having participants' feedback on the findings enhances the confirmability and credibility of the research.

The research also took advantage of peer debriefing with the supervisors which added considerable insights and enhanced intersubjectivity of the interpretations. This has been achieved through frequent supervisory meetings throughout the period of the study, including joint meetings as well as separate meetings with the director of the study who is

an experienced qualitative scholar. The ongoing discussions with the supervisors especially about the analysis process challenged the researcher assumptions and encouraged a higher degree of reflexivity. In addition to the supervisory meetings, consultation with the external advisor who is an agility scholar at the University of Liverpool took place, which has been very helpful in checking the researchers' interpretations of the data and shedding light on the researcher's blind spots (Manning, 1997).

Moreover, in order to ensure that the study's findings speak to real life events and contexts, and represent the perspectives of participants as clearly and authentically as possible, the researcher provided as many direct quotations from the interviews in support of the findings. In that way, the research gave voice to the participants and their multiple and conflicting views, and consequently readers can judge whether participants' experiences have been represented in an unbiased way.

Transferability refers to the extent of the finding's applicability in other similar contexts (Johnson et al., 2006). As one of the aims of the study was to provide guidance for practice, transferability is taken into account. While the researcher acknowledges that the results are not generalisable to all other contexts, sufficient details about all participating organisations, their backgrounds and conditions of their business environments are provided. This information, in addition to the direct quotations from participants can assist practitioners to evaluate whether the study findings and recommendations can be relevant and applicable to their unique situations.

Dependability refers to the extent that changes that happened in methodology and constructions are made available for assessment (Guba and Lincoln, 1989). Likewise, confirmability refers to the extent that detailed accounts of the data collection and analysis processes are available for reader evaluation (Guba and Lincoln, 1989).

The strategy applied for enhancing the dependability and confirmability of this research was the provision of an audit trail or chain of evidence as recommended by many authors (e.g. Yin, 2003, 2012; King, 2012). It has been achieved through keeping a research diary from the early stage of the research design and recording all shifts in methodology and any decisions made about sampling, the data collection process and more importantly, a detailed account of the analysis processes. It includes a full record of the coding and

analysis steps and the way that templates were developed during the course of the analysis process, as well as the reasons behind major changes. Thus, readers are able to see how the initial architectures of the research have been modified as the researcher's understanding developed as well as evaluating how the eventual interpretations were achieved.

The use of NVivo proved very helpful in performing a rigorous data analysis by increasing the dialogue between the researcher and the data and enabling the documentation of the ongoing evolution of the research's main components and themes. Thus, it enhanced the credibility, dependability, confirmability and transparency of the research.

3.7 Summary of the Chapter

This chapter started by introducing the timeline and design of the research project following the model of 'progressive focusing' which suggests designing research in a way that allows a constant interaction between theory and data through an iterative and continual process of comparing data with literature. Then, the role of literature and the existing knowledge in building the theoretical and conceptual foundation of the research is described.

Next, the two major philosophical positions of research are reviewed and the philosophy of interpretivism was introduced as the paradigmatic stance of the research. In congruence with the employed philosophical stance of interpretivism, the research undertook an inductive approach in which qualitative methods were selected as an appropriate fit for undertaking this research. Then it proceeded by describing and justifying the selection of data sources that were used in this research including semi-structured interviews and documents.

The chapter also presented all criteria applied in selecting the participating organisations and interviewees and also procedures followed in collecting, storing and organising the data. It also provided explanations and justifications for the data analysis technique (template analysis) that has been used in the research. The application of NVivo software and the way it assisted the analysis process is discussed. Finally, the selected and applied quality evaluation criteria in this research are introduced. The next chapter presents the research findings structured around the five research questions.

CHAPTER FOUR

PRESENTATION OF FINDINGS

**Organisational Culture, Attributes of Agile People,
HR Roles in Achieving Agility,
and Characteristics of an Agile HR function**

4.1 Introduction

The findings from the research are organised and presented around each of the five research questions. Relevant data and information about each research question was extracted from the different participating organisations, and then categorised and coded using Nvivo software. The approach and method used for bringing structure and meaning to the collected data and for undertaking data analysis are discussed in Chapter Three.

The aim of this chapter is to provide an overview of the findings associated with RQ1 to RQ4. Due to the volume, the findings associated with RQ5 are presented in Chapter Five.

This chapter consists of five sections as follows:

Section 4.1.2: Introduction of Participating Organisations; provides information on the participating companies including their profiles, an overview about their agility programmes, their general understanding about the concept of agility, and their agility drivers.

Section 4.2: Organisational Culture and Agility; answering research question one, this section provides findings about the particular characteristics of organisational culture that are supportive in creating organisational agility.

Section 4.3: Agile People Attributes; presents the perception of the respondents about agility at the individual level. This section provides findings associated with research question two which searches for the characteristics of agile workforce that are central to achieving agility. It identifies the mindsets and behaviours that organisations need to develop among their workforce in order to create and sustain agility.

Section 4.4: HR Role in Achieving Organisational Agility; attempting to answer research question three, this section provides findings about the contributions that HRM can make in agility creation.

Section 4.5: Building Agility into the HR Function; answers research question four. This section identifies the conditions that need to exist within an HR function to be able to make contributions to agility creation. It reviews the structures and models of HR function,

provides information about facilitating HR technologies and software systems, and outlines the necessary characteristics of HR professionals in agile organisations.

4.1.2. Background of the Organisations

Since the main focus of this study is on people aspects of agility, general information about the organisations' background, their definitions of agility and their agility drivers are presented in the form of tables to shorten the discussion. A summarised background of the participating organisations is provided in Appendix C. Table 4.1 provides the perceptions of the participating organisations, as reported by the participants, about the concept of agility. Table 4.2 gives information about the main agility drivers - the pressures from and changes in the companies' business environments- which have led to taking actions including implementing new business/HR strategies and practices in order to become agile.

Although the majority of participants voluntarily gave their permission to the researcher to reveal their identities and their organisations' name, the researcher decided to keep the organisations' identities anonymous due to ethical considerations. Thus, the name of the organisations and other information that might help to identify them, have been removed from the thesis. Instead, each organisation was assigned a unique code to be used when presenting data. (See Appendix C)

4.1.2.1 Agility; Understanding of the Concept

The definition for organisational agility, adopted from the literature and provided to participants for clarification was: "The ability to scan continuous and unpredictable changes in the external environment, quickly and efficiently adapt and respond to change especially customers' dynamic demands and proactively taking advantage of change as opportunity." (Goldman et al., 1995; Zhang and Sharifi, 2000; Sharifi and Zhang, 2001; Sherehiy et al., 2008) Table 4.1 provides the perception of the participating organisations about the concept and their perceived definitions for agility.

This definition received a general agreement from the participants in the majority of the cases, although a comparison between the provided definitions across the firms and sectors showed some commonalities and differences. A cross-case analysis identified a relationship between the nature of agility drivers (shown in Table 4.2) and the provided

definitions of agility. Accordingly, their agility development programmes started differently with a different focus (workplace agility, business transformation, innovation). It can be derived that depending upon the specific circumstances of the organisations' business environments and their major drivers of agility, their perceptions of the concept, and consequently their responses to the drivers in the form of agility programmes and practices varied from organisation to organisation.

Another key finding resulting from a cross-case analysis is that the interviewees interpreted agility in different ways, using terminologies such as flexibility, adaptability, responsiveness, and innovativeness as alternatives. However, achieving strategic agility and capabilities to adapt and respond to changing external and internal environments is considered as an important dimension of the organisations' overall strategic vision.

Two other important points are:

- While there is evidence of commonality within the higher-order drivers of agility, these were not homogenous across organisations, as organisations in same sectors demonstrated more similarities especially in lower-order drivers. Table 4.2 shows the key drivers that public services organisations share in common.
 - There was a relationship between their agility drivers, their understanding of agility, and their definition of workforce agility, and desired agile attributes, and consequently the adopted HR practices to support agility. These findings will be discussed in more details in Chapters 5 and 6.
-

Table 4.1- The perception/definition of the participating organisations about the concept of agility.

Organisation	Perception
<p>1 Council 1</p>	<p>According to the senior HR manager, agility as defined and framed by the research fits with the Council’s strategic direction and the main aims of the Business Transformation programme. Referring to the four main strategies for achieving agility suggested by Goldman et al. (1995) -i.e. enriching customers, cooperating to enhance competitiveness, organising to master change and uncertainty, and leveraging the impact of people and information- he argued: <i>“I probably could see where Council 1 may be looking to try and move into some of those aspects of agility without knowing what agility is.”</i></p> <p>While the programmes and practices adopted under the Business Transformation agenda have effectively been targeted to strengthen the agility capabilities concerned by the literature (See Chapter 2), but they were not articulated in the way as suggested by agility authors. So, the organisation was not clear about what agility is. The senior HR manager reported: <i>“Council 1 is probably not clear about what agility is, so it probably talks around it, and it does talk about the concept of agility and the flexibility and the movement of employees within the organisation... but if it’s being clear about what does it vision that to be, I would say that’s probably a little bit blurred and confused at this moment in time.”</i></p> <p>The participants at Council 1 had a tendency to confuse the two concepts ‘agility’ and ‘agile working’ that had been introduced as part of the council ‘workplace agility’ project which drove the transformation of the Council’s operational property portfolio. For instance, the concept is defined by the agile working sub-programme manager in this way: <i>“agility is about the identification of the right place, and the right workplace solutions, to support people in doing their job more effectively”</i>. Similarly, a middle manager defined agility as <i>“empowering employees to become able to deliver the services under whatever circumstances that they find themselves.”</i></p>
<p>2 Council 2 (Housing Dep.)</p>	<p>Agility as defined by the research was perceived as important for the organisation to respond to the changing demands of their customers and pressures from austerity. However, the organisation’s agility programme does not fit completely in that framework. The programme implemented here was a ‘workplace agility’ project, but it has enhanced organisational effectiveness and agility by using property as a catalyst for change. As part of this, they implemented an agile working approach which made major changes to the workplace design and the way the organisation and people operate.</p> <p>According to the L&D manager, the term agility, means different things for different people across the organisation, while the general view is around what was suggested by the Agile Working Programme Manager : <i>“Effective integration of people,</i></p>

		<i>place and technology with a stronger focus on performance to achieve saving on costs, workforce productivity and sustainability.”</i>
3	Council 3 (Housing Dep.)	The definition provided by the Agile Working Programme Manager is in line with the research’s definition: <i>“being agile means easily respond to change, and manage risks, and deal with issues and problems as they arise, and quickly adapt the organisation to different environments.”</i> However, similar to the previous cases, they started their journey with a workplace agility programme as part of their customer service strategy, to have better quality interaction with customers, to be able to offer different channels of access to their services, from web to office to home to state, and everywhere in between. Also as explained by the participant: <i>“it (the agility programme) is trying to get staff and organisation into a way of working that delivers the services in the most efficient and customer friendly way. It helps saving money, increasing productivity, and also improving customer service by being able to deliver services to people in a more responsive way...”</i>
4	Council 4	<p>According to the OD Business partner, the Council has no programme particularly named and focused on agility in terms of the research’s definition. However, they have been on a similar journey to become a commissioning organisation in response to the huge amount of economic pressure and change facing by local government. As part of this, they have made major changes to the council and the way they operate:</p> <p>Transformed from a hierarchical bureaucratic organisation, which was traditionally structured and managed, into an organisation focused on achieving positive outcomes for ‘people’ and ‘place’, with a much stronger focus on what matters to local people,</p> <p>Improved efficiencies in response to economic pressures, have made £130m of savings over the last five years, frozen council tax, whilst continuing to invest in their economy and achieve better value for money of the taxpayer.</p> <p>Redefined their role as a local government county council by moving away from service delivery to an outcomes focus; to understand customer needs, forecast their future needs and make sure to commission the right providers and secure better outcomes for local people.</p> <p>Started to work far more collaboratively and move into co-design, co-production with communities, stakeholders and partners from the public, private and voluntary sectors across regional and national boundaries to maximise resources such as financial resources, buildings and property</p>
5	Council 5	According to the HR Manager, the definition proposed by the research fits with their understanding of the concept and with the philosophy behind their agility programme. Although their programme started by workplace transformation, the participants argued that their programme <i>“is not just about agility of a location but it’s about agility of mind, flexibility of job</i>

		<i>role and job purpose. It's not physical agility, it's more about the agility of all joining together, all being flexible across different roles, different places, different times, and being able to be where the service needs us to be, rather than where we think we ought to be. And in order to make an organisation agile, transformation of people and workplace and technology should all be considered together."</i>
6	Company 1 (Telecom)	According to the participant, the definition presented by the research fits with the company's characteristics and capabilities. He perceived their company as an agile company: <i>"we are quick in spotting and seizing opportunity and we are able to react quickly to the demands that are out there in the marketplace...but our journey to agility is ongoing..."</i> He also clarified that <i>"... for us, workplace agility and agile working are parts of the organisational agility"</i>
7	Company 2 (Banking)	The participants perceived the research definition of agility as matching to their understanding of the concept. The following statements include the definitions presented by the participants: <i>Ability to sense the trends and changes in business environment, understand them and rapidly respond to them</i> <i>Ability to reconfigure resources and operations to adapt to the changes quickly</i>
8	Company 3 (Multi-Businesses)	The participant recognised the concept of agility as defined by the research as necessary in thriving well in their current marketplace. However, she suggested: <i>"we don't use the term organisational agility as you defined per se, but it is however part of the fabric of what we need to do to deliver our businesses. We've got such a broad range of businesses, they all by definition and necessity operate at different paces, so there's always a demand to respond to external business factors, but given the range of businesses that we have, they have to have a different intuitive culture to respond to their businesses in a different way. So there's a diversity of organisational culture in those difference, of which there is an element of agility. However, it's not a terminology that we use to make changes per se."</i> She also clarified that they use the agility term to refer to their 'workplace agility' programme.
9	Company 4 (Real Estate)	The research definition of agility clearly matches the company's perception of the concept. The definition provided by the participant was <i>"being prepared to change rapidly, being reactive as well as proactive in understanding the change and responding to change and spotting opportunities."</i> He also added: <i>"I always say agility is a state of mind. I mean it's quite a high level definition but it's a state of mind that you are prepared to change rapidly, all the processes and systems follow on behind, but the main thing is people's mind set. At an organisational level, an organisational mind set, you are prepared to change the world instead of reacting to it in a reactionary way, and clearly all the things like the business model, technology and workplace are neighbours to that, but the main thing is mind set."</i>

10	Company 5 (Utilities)	The participant defined agility in this way: <i>“it is all about being able to respond and change quickly. It’s about being able to go from one direction, change direction quickly. It’s all about speedy responses...”</i> He explained for achieving that they started from transforming workplace and buildings by advancing and integrating their workplace, technology and their HR.
11	Company 6 (Law)	The participant defined agility as <i>“Being quicker to change and adapt”</i>
12	Company 7 (Instruments Manufacturer)	According to the participants, agility is defined and framed by the research perceived as necessary for the company survival. The following is the definition that they have provided for agility: <i>“the ability of an organisation to be able to adapt to a changing market”</i> ... they also reported that <i>“the market that we’re in is evolving very rapidly, we have to bring out two or three new products every year, some of our products change quite quickly....there is a need for us to have an agile organisation as we’re a company that survives on innovation”</i>
13	Company 8 (Aerospace)	The participant outlined that their organisational success and survival depends on agility. He defined agility as: <i>“rapid and flexible responses to constantly changing environments... rapidly changing the way you work, quick strategy adaptation to the changing situations in order to provide the best value to the customers”</i> . He also added <i>“there are several examples I can see from where we unknowingly implement best practices which are based on agility, the way we organise or structure our functions which are agile- in line with the definition that your research provided, without referring to them as agile practices or agility.”</i>
14	Company 9 (Automotive)	The definition provided by the participant was in line with the one that research considered: <i>“Agility requires organisations to be innovative and be ahead of time and be proactive in scanning changes and understanding customer demands and being prepared to respond to those requirements and changes quickly and efficiently.”</i>
15	Company 10 (Food)	Agility as presented by the research was commented upon by the participant as a prerequisite to thrive well in their dynamic competitive marketplace. She defined agility as: <i>“It’s around understanding what’s going on in the business environment, what are the changes that are happening, and to be adaptable and able to quickly respond to them....”</i>
16	Company 11 (Medical Tech.)	Agility was perceived as a step beyond the lean approach in this company. While the definition provided by the research was in line with their understanding of the concept, the participant had a tendency to define the concept at a more operational level rather than a strategic level: <i>“agility is about being be able to develop and test at the same time. So, instead of developing a product or service, which may take three months, and testing it three months later with customers and getting the feedback, working in an agile way is that you launch something which is not finalised after two weeks, you test it with customers, you</i>

get the feedback from customers after two weeks, you improve it, you launch it again, you test it with customers, you get the feedback from customers, you improve it. So it's a two-week cycle or one week cycle. And that enables you to be more customer focused because you develop a product that's really the customer wants to use, because they've been involved at the early stage of testing, and also it reduces the cycle time because of development and testing at the same time. So you are reducing your cycle time and launch to market..."

The participant also added: *"It's actually in the mindset and the ways of working which is quicker, faster and cheaper towards customer. It's about setting the right standards to get quality at the right cost. So that implies efficiency in a lean way. So with agility you've got three things to recap: change, quality and efficiency..."*

**17 Company 12
(Electrical
Manufacturer)**

According to the participant, the definition and framework proposed by the research fits with the company's definition and situation. The following is the definition that is provided by the participant: *"Being more customer focused, and more market led, being able to respond quickly and effectively to changing market conditions, changing regulatory requirements."*

He also reported that agility in the company started by responding to imminent legislation and regulation by developing appropriate instruments, then agility grew out of the manufacturing system, it spread into the product development system, and then into the sales and service areas of the business.

**1 Consultancy
Company 1**

The agility consultant defined agility in this way *"agility is about working differently and taking advantage of opportunities, principally new technologies kind of presenting and changing things around that to do things more efficiently and more effectively. It's about cutting out bureaucracy, doing things much more speedily in terms of market consideration and development, and that's why you often find the agility thing is very much about speed of operating, whether it's developing software or doing more visits per day in a health sector."*

**2 Consultancy
Company 3**

The agility consultant defined agility in this way *"it relates to how quickly a company is able to move, is able to adapt, and it refers probably totally to Darwinism which is companies, not actually the fitter survive but the most adaptable survive"* He also added: *"A company is an inanimate object, it does not exist, it is just a group of people. So for an agile organisation the most important factor is that the employee is allowed to achieve maximum productivity with the optimum work-life balance built into it. Second important factor is that a company be able to adapt to whatever working environment they are in on the shortest notice possible, and they need that to survive."*

Table 4.2: Agility Drivers; Conditions of the Organisations' Business Environment

Organisation		Conditions of the organisations' business environment
1	Council 1	<p>The public services organisations share the following key drivers for agility:</p> <ol style="list-style-type: none"> 1. Changes in the business environment; including economic and political changes: <ul style="list-style-type: none"> • The global recession has resulted in a period of austerity which has had implications for all public services including councils. They have had to look carefully at how they use their resources, and achieving better value for money of the taxpayers. • The pressure of austerity has made them to improve performance by providing the optimum working environment suitable for innovation and creation • The pressure of austerity has made them to save money by reducing property costs and working in more productive, collaborative, innovative, efficient and customer friendly ways 2. Changes in customer requirements; <ul style="list-style-type: none"> • The changing needs and wants of communities, families and individuals • Increasing demand for quicker delivery time, better quality interaction, different channels of access to the services 3. Changes in social factors; including changes in workforce expectations such as expecting a better work-life balance, an increasing demand for flexible working and home working (due to responsibilities for child care, elderly parents etc.), different style of work and requirements of the new generation, legal and political pressures giving employees the right to work flexibly, environmental pressures for reducing carbon emissions 4. Changes in technology; It has changed how, when and where people work, it also created a virtually borderless workplace that connects employees, customers, partners and suppliers, it changed the work structures and reporting relationships.
2	Council 2 (Housing Dep.)	
3	Council 3 (Housing Dep.)	
4	Council 4	
5	Council 5	
6	Company 1 (Telecom)	<p>They operate in tough market conditions which are characterised by: high levels of change; strong and new competition; declining prices and in some markets declining revenues; technology substitution; market and product convergence; changing customer's expectations; and regulatory intervention to promote competition and reduce wholesale prices. Customer expectations are changing. Households are increasingly reliant on their fixed-lines for access to the internet. Their expectations around service continuity and reliability have therefore risen. These all require the highest levels of responsiveness, organisational agility and operational resilience and security.</p>

<p>7</p> <p>Company 2 (Banking)</p>	<p>The company has been facing a challenging economic environment in recent years. Increased impairments arising from the severe economic downturn and operating in a very competitive market mean they have had to plan for cost reductions, to reduce its earnings vulnerability. They had a substantial loss for 2013. The company is subject to public and political scrutiny. Conduct risk and compliance with changing regulatory requirements is one of the most significant issues facing the bank. They also face challenges arising from cyber attacks which impacted upon their ability concerning information protection and controls over user access, so resilience of their information technology systems is essential to the group's operational sustainability. They also face intense competition for talents while they have been unsuccessful in recruiting or retaining suitable staff.</p>
<p>8</p> <p>Company 3 (Multi-businesses)</p>	<p>2013 has been disastrous for the Group. The massive losses (£2.487bn in 2013) caused predominantly by the Bank and the Group's subsequent dilution of the Group's stake resulted in loss of control of the Bank. Some of the key challenges facing by the businesses at the Group are as follow:</p> <ol style="list-style-type: none"> 1. Changes in markets and competition; <ul style="list-style-type: none"> • The adverse UK economic conditions following by price inflation and further government austerity measures put consumers' disposable incomes under pressure which impact upon the Group's performance. • The price reductions by competitors impact their sales and margins • They operate in highly competitive markets, so have to constantly review and adapt their ranges of goods and services and their price positions to reflect changing customer demands and expectations 2. Changes in customer requirements; <ul style="list-style-type: none"> • Pricing has been the main challenge. They need to keep improving their value proposition by reducing prices on products in line with their competitors. • Quality expectation is increasing for the products and services especially their own label range • Challenge for attracting younger customers and building deeper relationships with them • Customers' demand for digital offers such as easy online shopping and mobile apps. 3. Changes in technology; <ul style="list-style-type: none"> • Introduction of online services • Introduction of mobile app which allows customers to find their closest store and check on deals. 4. Changes in social and legal factors <ul style="list-style-type: none"> • a number of businesses operate in highly regulated environments which brings many costs and risks to the

	<p>businesses</p> <ul style="list-style-type: none"> • Regulatory change and uncertainty about the future of their General Insurance business • As expected, they adhere to the highest social and environmental standards which include <ul style="list-style-type: none"> - Protecting the environment by reducing their greenhouse gas emissions (GHG) - Keeping communities thriving, - Inspiring young people to gain skills, knowledge and experience - Responsible retailing by making healthy and ethical offers accessible to people - Making Fair-trade products available
9	<p>Company 4 (Real Estate)</p> <p>The company operates in rapidly changing and competitive global markets which present unique challenges as well as great opportunities for the firm. Economic instability across the globe coupled with workforce demographics are influencing how the organisation is managing and investing for the future. Technological advancements are transforming the way they connect with their employees and customers. In the real estate space, clients are increasingly demanding more value and an integrated approach to minimise risk and enhance delivery efficiency. The company as a global provider of real estate solutions needs to meet demands being driven by the rise of regionalisation, e-commerce, technology and transportation costs and government regulations and help its clients in making property decisions, reducing their operating expenses and maximising efficiencies in inventory, service time and delivery. They need to provide new real estate strategies that manage their current demands and plan for the uncertainties and surprises of the future.</p>
10	<p>Company 5 (Utilities)</p> <ol style="list-style-type: none"> 1. Changes in market and competition; <ul style="list-style-type: none"> • Although the general economy is recovering, customers' incomes have been squeezed. So, they need to manage their business efficiently to keep their costs and bills down to ensure that their services are affordable • The UK's population is growing, placing more pressure on water resources and networks. They need to ensure they have sufficient capacity; • Changing demographics and fluctuations in the investment market affect their ability to fund certain improvement and investment schemes. • Competition for attracting business retail customers is intense 2. Changes in customer behaviours, expectations and requirements <ul style="list-style-type: none"> • Achieving a balance between improving their services and keeping bills low, while providing a fair return to

shareholders

- Improving operational performance and improving the quality of the drinking water despite difficult weather
 - Reducing the average duration of interruptions to the supply
 - Providing them with more convenient interaction channels and an excellent and more responsive customer service
 - As a regulated utility service, customer satisfaction is vital for maintaining legitimacy. Failing will lead to financial penalties under Ofwat's Service Incentive Mechanism (SIM)
3. Changes in technology;
- Introduction of innovative technologies for interacting with customers: web self-service offering, mobile payment app
4. Changes in social and legal factors;
- Changing expectations of their diverse Workforce
 - The company is a highly regulated business performing in a changing regulatory environment of the water industry. So, their performance is monitored by a series of agencies and Inspectorates
 - Expectations to make significant economic, social and environmental contribution to the regions they serve.
 - Intense competition for talent and skill shortage : they respond to this by investing in skills development and apprenticeships, supporting young people to join their industry
 - Protecting employees' health, safety and wellbeing, and aligning their interests with shareholders' interests
5. Environmental pressures;
- Challenges to meet the requirements of the Water Framework Directive and other environmental imperatives.
 - Main issues are reducing serious pollution incidents, reducing greenhouse gas emissions, compliance at waste water treatment works producing renewable energy

**11 Company 6
(Law)**

The legal sector has been challenged by the recession, so in recent years this was challenging for the company as a law firm. The legal services environment is changing very rapidly; there are many changes in their external market that are affecting their business model. These include significant legislative and regulatory changes such as MOJ portal and reforms in relation to whip lash claims and also changes in relation to the recoverability of costs which all impact the market and their model in handling road traffic accidents, employers' liability and public liability claims.

Over the last 15 years, the buying power of the insurance companies and the public sector organisations for whom

they work, has increased. Their operating costs have increased in terms of property, information security and IT, so the margins have dramatically reduced. Clients expect a higher quality of advice, speed of response, understanding of their business and commerciality of approach. According to the participant: “All of these changes make it imperative that we become quicker to change and adapt... and doing things in as efficient or lenient a way as possible.”

Their response to these challenges mainly include:

- A strong strategy, prudent financial management and a diverse practice strategy.
- Developing a new people strategy to support the overall strategy. It includes alternative career paths and routes to qualification to widen access to the profession.
- A bespoke leadership coaching programme where all partners were involved in defining a leadership style for the new firm and to help reinforcing the culture.
- Implementing information security management to achieve ISO 27001 accreditation
- Updating the firm’s underlying IS infrastructure and its integration with their ‘client dashboard’ which provide clients with up-to-date management information
- Developing a Generator CRM programme
- Reviewing and improving transactional operational services

**12 Company 7
(Instruments
Manufacturer)**

Their marketplace is evolving very rapidly, some of their products change quite quickly; there is intense competition regarding the introduction of new innovative products in a shorter cycle time and launch to market. The main areas of challenge are reported as: 1. Changes in the market and competition including increasing rate of change in products, decreasing new products time-to-market, increasing rate of innovation, responsiveness of competitors to changes.

2- Changes in technology; including technological discontinuities, application of new software technologies in products

- 4- Skills shortage and facing competition for talents: Specially for the roles such as software engineering and product technical marketing role which needs both scientific knowledge about the products as well as marketing and commercial skills.

13 **Company 8**
(Aerospace)

1. Changes in market;
 - They operate in the highly regulated nature of the aerospace industry
 - New markets are emerging, shifting the balance of economic power.
 - Reducing costs and improving inventory turn are vital for effectively competing in their challenging market
2. Changes in competition criteria;
 - Operates in competitive markets.
 - The competitors in the majority of their markets are large, financially strong. So, they are under significant price pressure for original equipment or services even where their markets are mature or the competitors are few.
 - The main competitors have access to significant government funding programmes as well as the ability to invest heavily in technology and industrial capability.
3. Changes in customer requirements;
 - Customers demand on-time delivery, quality, safety, responsiveness and reliability
 - Customers demand a competitive portfolio of products and services
 - Customers demand innovation that improves performance and reduces the environmental impact of their power systems
 - Innovation is their lifeblood. Must continually innovate to remain competitive. Ensure their innovation is relevant to customers' needs.
4. Changes in technology;
 - It is essential to develop new technology for future engine programmes and to enhance existing products
 - World-class technology gives them competitive product performance.
 - They modernised their IT infrastructure and launched their Shop Floor IT modernisation programme.
 - Launched an Integrated Production Systems programme addressing the need for simplified, globally scalable and secure systems.
5. Changes in social and legal factors;
 - Regulation is driving the requirement for cleaner power and setting new standards for business conduct.
 - Challenging criteria for reducing the environmental impact of their products and services.
 - Compliance with legislation or other regulatory requirements in the regulated environment in which it operates is essential for their ability to conduct business
 - Challenge for attract young people to Science, Technology, Engineering and Mathematics (STEM) subjects.

14	Company 9 (Automotive)	<p>Operating in the automotive industry means facing significant market fluctuations and rapidly changing conditions. The company needs to operate sustainably if it is to survive over the long term. For them sustainability comprises of three aspects: economy, society and ecology. This put pressures on them for reducing noise and pollutant emissions and concentrating on recyclable materials and creating a sustainable environmental protection according to ISO 14001 or the EMAS Regulation and also following occupational safety policy according to OHSAS 18001. Their partners expect reliability and on-time delivery and their customers expect reliability, quality and durability from their products. Competition is on time, cost and innovation in products. Quality is one of the most important prerequisites for their market success and growth. Innovation and application of advanced technology is the company's lifeblood in order to develop and manufacture transmission solutions for the automotive industry.</p>
15	Company 10 (Food)	<p>The company performs in an increasingly regulated industry and a tough economic environment with continued inflation and competitive trading conditions. The increasing prices of feed ingredients have been a big challenge for the group. So, innovation and new product development are essential for continuing success. They need to keep improving their value proposition as there are increasing expectations for the highest quality products at the lowest cost. The Group is under a range of social, environmental and legal pressures such as limiting their impact on the planet, making good food sustainably and ethically, helping young people learn about food and the food industry, and being a great place to work.</p> <p>Drivers of HR Agility:</p> <p>They have gone through a massive amount of change in the last couple of years, growing at a phenomenal rate by a series of significant acquisitions from a company with 9,000 employees as a poultry business, to now having 24,000 people in a range of market sectors, with a range of diversified products and customers. These changes have some implications for people especially for those employees being acquired. Pressure on pricing leads to more pressure on delivering operations at lower costs. The regular refreshments of the product ranges and constant change in operations are extra challenges that the workforce has to deal with. They have to be extremely adaptable to different standards and different processes. In addition, skills shortages in the food industry have made the recruitment environment more challenging.</p>
16	Company 11 (Medical Tech.)	<p>According to the company's annual report 2013, their biggest risk is their inability to seize market opportunities,</p>

17 **Company 12**
(Electrical
Manufacturer)

As new regulatory and cost demands continue to affect the tobacco industry, the competition is tough and customer requirements are increasingly changing. The company is determined to maintain its market leading position and as such invests a significant proportion of its revenue on in-house research and product development. This commitment demonstrates its philosophy of innovation and continuous improvement. The strategy was to develop innovation capability across the business that delivered a pipeline of innovative new products, to embed continuous improvement in all areas, to create a fast response - lean manufacturing system that could accommodate this flow of new products, and to exploit existing and emerging market niches with a faster and more innovative response to market needs than the competition could offer.

4.2 Organisational Culture and Agility

This section presents findings associated with research question one:

RQ1: What is the role of organisational culture in achieving agility? What are the key characteristics of organisational culture that are critical and supportive in creating organisational agility?

It is consistently highlighted by participants that organisational culture and shared values are fundamental to organisational agility. The particular characteristics of organisational culture and shared values that were frequently mentioned by the participants as important to agility are summarised in Table 4.3:

Table 4.3: Characteristics of Organisational Culture that Supports Agility

Characteristics of Organisational Culture that Supports Agility	
<ul style="list-style-type: none"> • Personal accountability for excellent performance • Trust • Personal responsibility for supporting colleagues • Open communication environment for sharing ideas and concerns • Recognising the contribution of people • Desire to continuously improve • Collaboration, consultation and discussion with colleagues, suppliers and customers • Sustainability • Being change ready and responsive • Leading by example with openness and honesty <p>Continues...</p>	<ul style="list-style-type: none"> • Customer focus • Flexibility • Teamwork • Risk-taking • Creativity • Fairness • Diversity • Integrity • Fast response • Thinking long term • Being innovative • Empowerment

For instance, the Managing Director of Company 12 (Electrical Manufacturer) suggested that organisational culture plays a fundamental role in creating agility. He emphasised that agility is very much embedded in the people’s mindset and shared values. In his view, it is a group of people with a culture that facilitates agility, rather than a selection of tools and techniques or the technology:

I believe the agility comes from developing a culture within the organisation, where a fast response and an ability to change is something that's valued, recognised and rewarded. Where there is a desire to continuously improve. The agility grows out of a very deliberate attempt to change the culture within the business, changing the culture to one that will enable more radical innovation. ... the ability to think more radically, to respond to changing conditions and come up with something that was different in terms of new to the industry, new to the company....to provide that fast, flexible response to customer current and emerging requirements... So looking forward in consultation and discussion with customers to be able to identify what the emerging needs are, to have that discussion and be able to react very quickly to that.

A HR leader from Company 2 (Banking) supported this view by reporting that at Company 2, they have strived to change the culture across the business and reinforce a common set of values which enable more agility and responsiveness. As part of this, they launched a new set of values in 2013 which focus on customer focus, teamwork and collaboration, personal responsibility for supporting colleagues and performance, doing the right thing and thinking long term. They have tried to put this common set of values at the heart of their business, guiding how they lead, reward, make decisions and treat their customers and each other.

She compared their current culture with the one they expect to create and maintain:

our culture is still steeped in history where, we're still quite hierarchical, people don't always collaborate with one another, people don't really think of something like diversity as being important, there's still bias that exists in the organisation. Our aim is to create a culture where it's about putting customers first, it's called thinking outside the bank, so it's about if you were in your customers' shoes, how would you want to behave?

In the same way, a strategic consultant from Company 4 (Real Estate) argued that organisational mind-set is the most important factor in creating agility. He listed the values that are supportive for agility as: being change ready and responsive, valuing risk-taking and creativity, rewarding people for taking risks and being innovative, recognising the contribution of people, thinking long term not just from the current products but for the next initiative and innovation in the following year's products.

Similarly, the participant from Company 8 (Aerospace) highlighted the following share values as important for agility and innovation in their company: trust, customer focus, teamwork and flexibility, leading by example with openness and honesty, empowerment,

personal accountability for excellent performance, personal responsibility for supporting colleagues, open communication environment for sharing ideas, issues and concerns.

The findings suggest that creating an organisational culture that values, recognises, rewards and enhances the behaviours required for organisational agility is the most important step in creating agility. The next part of the investigation was to discover how those embedded values and beliefs should be manifested at the individual level. In other words, if the organisational culture and the shared values are evolving to support agility, what distinctive set of mindset and behaviours are expected to be developed at the individual level. The next section will answer these questions.

4.3 Agile People Attributes

This section provides the findings associated with research question number two.

RQ2: What are the characteristics and attributes of people which are central to achieving agility?

This section presents the perception of the respondents about agility at the individual level. It identifies the capabilities, skills, mindset and behaviours that organisations need to develop among their workforce in order to create and sustain agility.

In pursuit of creating organisational agility, the managing director of Company 12 (Electrical Manufacturer) emphasised the importance of two factors: organisational culture that facilitates agility; and people with learned behaviours, embedded values and beliefs that provide the agility. When asked to define the desired people attributes that agile organisations should create, he suggested:

.. one thing that an agile organisation will have, and a non-agile organisation doesn't have, is the willingness of the people to try different things..., adapt and modify. Change becomes the norm. The agility comes from people who think outside the box, think laterally, who are willing to try different things and gathering and developing that knowledge. It is definitely not just repeating things in the same way, following the same processes, same procedures. Where a customer wants a fast response for a new problem, people are not going to find the answer in what they've done before, ... (rather) in a series of experiments perhaps or exploring different things.... There's also an ability to scan the horizon, to look at what's happening if you like away from the core focus of the business. So it's what's called peripheral vision.

He further defined the *peripheral vision* as:

Having the laser like focus on what the business is about, its core competencies and what it's trying to achieve, it's also cognisant of what's going on in associated areas. So it can read the signals for what's happening. That can be a combination of inputs from customers' inputs and suppliers input from people who are out in the field talking to other customers, perhaps talking to competitors, it will come from trade shows, it will come from liaisons with the universities.

Similarly, a strategic consultant from Company 4 (Real Estate) suggested that agility is a state of mind. He highlighted that for achieving agility, the main factor is existence of an agile mind-set at an organisational level. He further defined this mindset as unconstrained, focused on adding value to the business, enhancing customer service, and innovation:

*Agility is a state of mind that are you prepared to change rapidly... The main thing is people's mindset. ...and clearly all the things like the business model, technology, **workplace**, policies and processes are just enablers, but the main thing is mindset. .. Are you set in your ways or are you continually doing the same thing, or are you constantly looking for opportunities to change and change the world and adapt and adapt the way you do things... So all employees need to have a mind-set which is unconstrained, which is focused on adding value to the business, enhancing customer service, innovation or whatever the key drivers are around agility.*

When he was asked 'should all individuals possess these characteristics?' he suggested:

Well I think the organisation creates the mind-set, or fosters and promotes the mind-set. I believe most individuals can be agile, but if they're constrained by an un-agile organisational mind-set they won't be agile. I think it's about how the framework is developed to motivate and encourage and reward and empower people to be agile, rather than individual specific.

The OD Business partner from Council 4 also highlighted a series of behavioural characteristics as attributes of agile employees:

Agility from a behavioural point of view, it's about being articulate, being able to communicate compellingly, being ambitious so thinking about improvement and innovation, being perceptive, so understanding the wider perspective, about being strategic, and driving for performance and results, leadership is around leading self and others, and integrity through insights or thinking.

When the participant was asked 'should all employees manifest these characteristics?' he, embarking upon the current change in their organisational design, suggested that these behaviours should be translated differently for different levels of jobs and for each individual role:

It will be different dependent on jobs and different types of roles... we know what retained capability we need in the future from the organisation design piece... the behaviours are mapped against different levels to give an indication, and we'll work with the local team to think so what does this mean for you in your roles in practice, and start to make it real for individuals. So all people need to be proactive, absolutely, in all their roles, and how they do that in their different roles, which are incredibly diverse across a local government organisation, it will look very different dependent on their role, their specialism, their level...

The view from the HR manager at Council 5 was around being trusted and being able to think and behave differently:

I suppose on agility at an individual level is much the same as a more macro level, at individual level it's important for people to have a thought process that they're delivering for the end customer, for the end process, rather than delivering for themselves.

She also argued that certain agility attributes are part of peoples' personality. So, organisations cannot teach people to have the certain attitudes or aptitudes:

there are certain technical things that you can teach people to do, but you can't teach people to have the right attitudes or the right aptitudes...we've only just started looking at the job descriptions and recruiting people on that basis.

At Company 3 (Multi- Businesses), the head of business transformation reported that they did not define the employee agility attributes as part of their agility programme. However, their competency model includes the desired people attributes which are necessary for agile organisations. The expected skills and behaviours are reported as being confident, resilient and flexible, customer-focused, team worker and collaborative.

The HR director from Company 7 (Instruments Manufacturer) highlighted a list of people competencies that agile organisations should create in order to drive agility. These include being accountable, empowered, collaborative, innovative, risk taker, able to make quick decisions and initiate change, having appetite to learn, and understand the business. She argued that although parts of these characteristics are personality traits, they have deployed management and HR practices to create these attributes among their workforce.

The qualities of flexibility, adaptability, and having a change-ready mindset were also highlighted by another senior manager at Company 7 (Instruments Manufacturer). He has been working for the same company for over 20 years during which the company has changed and grown from a small team of 50 people to 5000 people spread out across the

globe. He, embarking upon his experience of observing the Company 7 (Instruments Manufacturer)' growth, argued why people are less adaptive and less receptive to change in large organisations:

I think unless people can see the context of change, they can understand why the business is changing or why their role is changing, and then I think people can adapt. People change and adapt based on their experiences and based on some kind of external stimulus. That's the kind of normal human behaviour I think is to adapt around the circumstances, that's why we've evolved, it's about adaptability. The problem with some large companies is the outside world environment, people are not in contact with that, so they find it very difficult to see the reasons why they need to change and adapt... (whereas in) a small company, not only were you very close to that external environment and touched it every day, so it was a real experience in there that people could actually see why we needed to change....

He also argued that agile organisations need people who assume multiple roles and have balanced skill-set to be able to quickly move between assignments and rapidly respond to changes:

some people find it difficult to change 'cos of skills sets, so there's some practical HR stuff, which is moving people between functions, just so that people have got a more balanced skill set, which means that if you can convince people that we need to change, that it's easier for them to change, because they've got some experience in some other functions.

The view from the talent manager at Company 10 (Food) was around being adaptable, business driven, responsive to changes, proactive and flexible:

I think it's around being adaptable, and being able to understand what's going on, what the change is, and to be able to respond as well. We've got similar organisation competencies that are around the fact that we keep moving and we don't stand still. So one of our competencies is around sort of never being comfortable with what we've got, and never being satisfied that good is good enough, and what else can we do to improve, how can we set ourselves more challenging goals and targets, how can we be better and be the best.

Company 5 (Utilities) has a behaviours model which outlines the range of behaviours that all employees need to demonstrate to ensure they are all consistent and aligned in the way that they work. The behaviours model is an integral part of their recruitment process and provides a guide for managers to assess behaviours and performance and to identify development needs. There are five behavioural areas which are relevant to everyone as Figure 4.1 shows. Team leaders should also demonstrate responsible team leadership behaviours. There is also a leadership model which outlines the behaviours needed to be

demonstrated by strategic leaders, directors, senior managers and middle managers. Although described in different terms, these groups of behaviours reflect many of the agile attributes identified by agility authors described in Chapter Two.

Figure 4.1: Company 5 (Utilities)’s Behaviours Model, Source: Internal document: Company 5 Behaviour Model V2 15/4/08, page 3

People in Company 5 (Utilities) demonstrate the following behaviours:
<p>Personal Maturity: Is self aware, Shows moral courage, openness and honesty in all dealings, Is resilient, optimistic and open to change, Has an Adult-Adult, collaborative approach to others, Is confident, assertive and self assured</p>
<p>Clear Thinking: Understands situations from all angles, Makes useful links to arrive at insightful plans and solutions, Puts customers at the heart of solutions</p>
<p>Drive to Deliver: Consistently delivers, Anticipates and overcomes obstacles, Continuously improves processes and ways of doing things</p>
<p>Effective Communication: Knows and understands the organisation, Communicates the right things in the right way to get buy in, Builds relationships and collaborates to solve problems</p>
<p>Responsible Team Membership: Enables team to perform well, Supports and encourages team to develop, Proactively contributes to creating a good team atmosphere</p>
<p>Responsible Team Leadership: Knows and develops the team, Consistently manages performance firmly and fairly, Inspires and motivates the team</p>

When a process improvement leader at Company 11 (Medical Tech.) was asked to describe the characteristics of agile people, she preferred to describe these attributes for an ‘agile team’ as she believes it is not easy to find all the desired attributes in everybody. However, it is easier to have a diverse group of people as a team with an agile mindset:

When you work in an agile way, you have to be open to new ways of working and adapt. To learn something, test it and getting the feedback, on a very short cycle of time, one week instead of three months, so people should be able to adapt in a very short time. It’s not easy for everybody to adapt, and to be flexible. But you can have a diverse group of people as a team with an agile mindset: who communicates very well, share information, and wants to improve all the time, share their knowledge and ways of working.

Similarly, a strategic consultant from Company 4 (Real Estate) suggested that in order to form a self-managed agile team, it is necessary to have a combination of different behaviours:

If you’re looking at self-managed agile teams you’ve got obviously a combination of introversion and extroversion behaviours and the introverts want to break out a bit

and have the time on their own a bit but that all needs to be reflected in the way the team manages itself and the autonomy and recognising and reflecting.

An agility consultant, who was the agile project manager at Company 1 (Telecom), also suggested that generally agile environments need people who are change-ready and empowered and have the ability to be receptive to new ideas to start with, but also to be proactive self-starters who try and find solutions. However, the HR task is more about the psychology, to mix and match different workforce capabilities in order to meet the desired performance output:

Managers and HR need to have a good grip on people's capabilities and the sort of capabilities that are going to be relevant to each individual job. So you need to understand your workforce in that sense. I mean you could have somebody who's really skilful, not particularly receptive to change and very introverted, but actually plays a key role in certain type of work for the organisation. And it's just trying to make sure from an HR perspective that what your capability is, that you want the organisation to have. So it's kind of matching and mixing training and developing to do it and it's got to be an inclusive organisation.

Although the participating organisations identified a series of desired mindset and behaviours as part of their competency models or behaviour models, none of the organisations had defined attributes of agile people as part of their agility programme. However, when participants were asked to define people attributes necessary for organisational agility, the identified attributes, which were specified in different terms in their behavioural/competency models, reflected many of the attributes identified by agility authors, as described in Chapter Two. The critical people attributes necessary for organisational agility as highlighted by the participants are summarised in Table 4.4:

Table 4.4: People Attributes Critical for Organisational Agility

<ol style="list-style-type: none"> 1. Having Change-Ready Mindset: optimistic and open to change, being receptive to new ideas, being prepared to change and recover from change rapidly, constantly looking for opportunities to change, willingness to change, adapt and modify what they are doing 2. Having peripheral vision: ability to scan the business horizon, and read the signals for what's happening, being perceptive, so understanding the wider perspective 3. Being Business driven: having commercial awareness, understand the business, being able to understand what's going on, what the change is, and to be able to respond 4. Being Resilient: to deal with adversity, not giving up if something does not go right, but finding another way of doing it and keeping moving forward. 5. Being adaptable and flexible: Assume multiple roles 6. Being multi-skilled: Having a transferable balanced skill-set, being flexible in deploying different roles, and filling a number of potential future roles. Being able to quickly move between assignments and rapidly respond to changes 7. Being Customer Focused: Enhancing customer service by having a genuine desire to understand customers, their needs, concerns and behaviours and to anticipate, meet and, wherever possible, exceed their expectations. 8. Having Drive to Deliver: having a desire to achieve and/or surpass standards of excellence and deliver business goals, initiating actions and making timely decisions. Consistently delivers, anticipates and overcomes obstacles by having concern for pace and completion 9. Proactively Initiate and Improve: Continuously improves processes and ways of doing things, being focused on adding value to the business, keep moving and don't stand still, never being comfortable and satisfied that good is good enough constantly looking for improvement opportunities, and setting more challenging goals and targets 10. Being Innovative: Willingness to experiment and explore different things, and being proactive self-starters who try and find solutions 11. Being Generative: having the appetite to learn ,having ability to learn fast and willingness to gather and develop new knowledge, share information and knowledge 12. Being Fast: able to make quick decisions, being fast paced and organised, have immediate reaction to changes, being quick in learning new skills 13. Having Clear Thinking: Understands situations from all angles, has the ability to make sense of data/situations, makes useful links to arrive at insightful plans and solutions and to make decisions 14. Being committed to core values: Adhere to the company's values and being protective of the reputation of the organisation. Empathises with the company's strategic objectives. Understands the day-to-day implications of them and works constructively with that understanding to move the organisation forward. 15. Being strategic: Driving for performance and results 16. Being empowered and trusted: being highly trusted and allowed the freedom to behave

and think differently, initiate change and take risks.

- 17. Personal Maturity and self-management:** being self aware, having the ability to recognise their capability levels, motives and emotions and the triggers for those. The commitment and determination to grow and develop as a result of this awareness. Being confident, assertive and self assured and showing openness and honesty in all dealings
- 18. Being Collaborative and Team player:** A desire to work collaboratively and supportively with colleagues and to engage easily with cross-functional teams, proactively contributes to creating a good team atmosphere and focusing on achieving objectives of the teams.
- 19. Effectively Communicate:** Being articulate and able to communicate compellingly, builds relationships and collaborates to solve problems
- 20. Being accountable:** being a risk taker and taking responsibility for the risks/actions taken and possible results

4.4 HR Roles in Achieving Organisational Agility

This section provides findings about the contributions that HRM can make in agility creation. The section attempts to answer research question number three:

RQ3: What are the roles of HRM in achieving organisational agility?

The critical roles of HR function in achieving organisational agility are delineated and classified into five categories as summarised in Table 4.5.

Table 4.5. The critical roles of HR in achieving organisational agility

Being Strategic business partner, co-crafting and implementing the firm's overall strategies, crafting and and implementing an agility-oriented HR strategy
<p>The HR role in agility development is mainly a strategic facilitating role.</p> <ul style="list-style-type: none"> • HR, as a strategic business partner, has an important role to play in co-crafting and implementation of the firm's overall strategies • Crafting an agility-oriented HR strategy and designing a highly dynamic and a supportive HR system which facilitates a quick response to the dynamic of the environment by easy and fast reconfiguration of HR processes, routines, practices, and human resources and their competencies.
Developing 'workforce agility capabilities'
<p>2-1) Developing a human capital pool possessing a broad repertoire of skills, knowledge and behaviours to ensure that organisations have the potential human resource capabilities to pursue alternative strategies.</p> <ul style="list-style-type: none"> • Obtaining the broad repertoire of skills and ensuring that various combinations and configurations of workforce capabilities can be achieved to take advantage of emerging situations or to overcome arising threats. This can be achieved in two different ways: <ul style="list-style-type: none"> ✓ having fewer numbers of multi-skilled employees (generalist), with broad sets of skills, knowledge and experiences, able to assume multiple roles and tasks and quickly move between assignments and perform in different capacities across different levels, and projects even external organisational boundaries ✓ Hiring a larger number of individuals who have narrow but special sets of skills (specialist) and deploy and redeploy them across different projects and tasks wherever their skills are required • Speedy identification and development of necessary competencies • Speedy renewal of competencies to avoid skill obsolescence: it demands the continual evaluation of contextual information and reassessment and innovation of the necessary workforce's skills and behaviours to ensure that workforce capabilities can accommodate the current and future requirements of the business.

<ul style="list-style-type: none"> • Fast configuration and re-configuration of these competencies • Crafting an agile talent management strategy which anticipates business needs and identifies current and future competency needs, including the required number of employees with certain types of skills as well as their collective competencies • Bringing together the right interventions to enable the business to keep moving fast and being responsive to external changes through attracting, developing, and retaining multi-skilled agile people. • Developing a workforce plan based on accurate workforce data and human capital metrics • Utilising a variety of talent acquisition strategies including various sourcing and employer branding practices to target and proactively recruit suitable individuals with agile mindsets and required skills in the employment market, or to develop their own talent pipelines • Motivating and empowering employees to accommodate the fast and easy renewal of competencies and re-configurations and to ensure that employees are motivated to utilise their capabilities and manifest the required agile behaviours.
<p>2-2) Promoting agility-oriented mindset and behaviours.</p> <ul style="list-style-type: none"> • Ensuring that employees in addition to the wide range of skills, possess a positive attitude and mindset to the changes, and have flexible and adaptive behaviours (as outlined in table 6.3) to rapidly redeploy different roles.
<p>Fostering Agile Culture</p>
<ul style="list-style-type: none"> • Crafting a shared mind-set and reinforcing a common set of values which enable more agility and responsiveness such as personal accountability, empowerment, autonomy in decision making, trust, openness, honesty, risk taking, innovation and creativity • Training, encouraging and facilitating leadership and management to put this common set of values at the heart of their management practices and the way they lead, make decisions and treat their team members • Putting this common set of values at the heart of all HR principles and practices guiding how they attract, develop and train, retain, and motivate employees • Strengthening the agile culture by adopting specific agility-oriented HR practices which promote agile behaviours and maintain agile culture • Maintaining the established agile culture by recruiting people who have agile attributes and can fit with the culture • Making sure that the new leaders understand what the agile culture is and to lead accordingly
<p>Creating Environment Which Facilitate Agility Development</p>
<p>Developing leadership:</p> <ul style="list-style-type: none"> • Support and empower managers to create a cultural foundation for agility, by developing and educating the leadership and creating a framework to enable autonomy and self-management • Playing a consultancy role as a business partner coach by promoting agility behaviours

<p>among managers, providing them with the skills and tools which facilitate the development of team dynamics and agility transformations.</p> <ul style="list-style-type: none"> • Focusing much more on empowering and enabling managers to manage their teams as this is the managers' responsibility to manage, and empower, engage and develop their teams • Supporting managers in the development of themselves and their team and facilitate these by providing them with clear policies, guidance and tools.
<p>Aligning the various components of organisational infrastructures and systems with the requirements of agility</p> <ul style="list-style-type: none"> • Moving away from hierarchical structures to a fluid, flat or matrix structure with 'semi-autonomous' or 'self-directed' teams. • Open communication: creating a climate of open and two-way communication with clear communication mechanisms and reporting structure, • Knowledge/information sharing: providing a seamless flow of information, ensuring information and knowledge are shared across the business quickly and effectively and providing inputs for quick and accurate decision making. • Utilising an adaptable workplace design
<p>Creating an Agile HR Function</p>
<p>Bringing agility to HR function itself, by focusing on three main factors:</p> <ul style="list-style-type: none"> • Highly capable HR professionals with agile attributes • Agile and flexible HR structures and work models • Agile HR processes and operational system and efficient HR technologies

4.4.1 HRM Needs to Be Strategic

A common view amongst interviewees was that HR, in order to contribute to organisational agility, needs to be strategic. For instance, the managing director of Company 12 (Electrical Manufacturer) suggested that HR, in order to play a significant role in agility development, should act at a more strategic level:

Coming from the perspective that agility capabilities develop through people, HR has a significant role to play. Now whether it's a separate HR department or whether that HR approach is embedded within the operations area I don't think matters too much. HR should act at a more strategic level, and then the technical HR are handled by the managers within the operations area... I think it's very important that the people involved in developing and managing agility are very much aware of what the people issues are and that HR is simply one of the strings to their bow in terms of how they will develop, how they will create and how they will manage that agility.

Findings from interviews strongly suggest that HR, when seen as a strategic business partner, can play a significant role in agility development. The majority of the participating organisations, such as Council 1, Company 2 (Banking), and Council 4, have made a significant change in the purpose, focus and structure of their HR along with the shift into the HR business partner model in order to support fostering agility and innovation. Shifting to an HR business partner role highlights the pivotal proactive role that HR function should play in co-crafting and implementation of the firm's overall strategies as well as configuration of the HR system.

For instance, at Council 1, the Excellence in People Management (EPM) programme (part of the council Business Transformation programme) has changed the role of HR as a function. The central aim of the programme was to reengineer the HR model and transform the HR function to become more business-aligned and strategic in nature. This means focusing much more on empowering and enabling managers to manage their teams more effectively using the manager self-service tools and the comprehensive, timely and accurate human resources advice, data and reports which are available on the company web portal. A senior HR manager at Council 1 explained it as 'change from being *order taker* to be a *strategic facilitator*':

It (HR at Council 1) has moved from doing the managers' job, so being the order taker like a waiter or a waitress, you know, what do you want me to do next Mr Manager for you, to a facilitator. But it's been quite a quick and challenging journey for the organisation.... but what it's had on top of that is the austerity challenge which added pressures ...

He further clarified the new HR role, by suggesting this is the managers' responsibility to manage, and empower, engage and develop their teams into doing the tasks. HR should support the manager in the development of themselves and their team and provide them with clear policies, guidance and tools.

The new HR system at Council 1 aimed to create adaptability, agility, creativity, and commitment in its employees. The change in the purpose of HR was supported by reengineering many traditional HR practices at Council 1. For instance, a revised behavioural framework and performance and development review process has been developed to give people freedom to use their talent and creativity and become more engaged and committed. They have also changed their work designs and job descriptions,

talent management strategy, learning and development, and leadership development practices which will be explained in detail in the next chapter.

A HR leader from Company 2 (Banking) reported that their agility programme started from property, but it evolved to technology, and made some evolution in their HR system. She explained their HR journey and how they moved from being a quite reactive people services function to a proactive business partner which understands the business and supports managers in driving strategic decisions:

We were very much a kind of people services function, existed to support our business and serve the very transactional element of HR ... We now have a business partner model with strategic partners who will actually step on board to help managers in driving decisions and direction of the business from a people plan point of view. HR having more value now, being more proactive in terms of going into business and saying let's improve your business. We've gone from being quite reactive, so sure everybody's written a policy and then over to you. We are now being much more proactive, to come out and helping people support them to see how different policies and practices could work for them.

The HR director of Company 9 (Automotive) summarised the main roles of HR in the context of agility in three pieces: “*HR should know the business, live the business, and deliver the business.*” His view is supporting the other participants’ view which is that ‘HR should have a deeper strategic partnership role in organisations aiming for agility.’

It means a traditional HR function which heavily focuses on administrative tasks and enforcing standards and compliance, cannot meet the requirement of agile organisations. For instance, when a process improvement leader from Company 11 (Medical Tech.) was asked about the role that HR function can play in agility development, she argued that HR is expected to develop capabilities and retain talent, while traditional HR usually focuses on administrative operations. She also highlighted that HR needs to promote agility behaviours among managers as it is ultimately managers who should reinforce agility culture and shared values among their teams:

What we love HR to do is to develop people and to retain talent. And to recruit people that we need for the organisation to keep a competitive edge... It's been going on for many years that HR people are doing admin rather than develop strategy that making sure we recruit the right talents. So I think this kind of HR is not the right place to run the agility... HR can contribute to help the manager to drive innovation, but I think the biggest impact in the decision is taken by the manager. So if the manager is not

bought on the agile way, it's very unlikely the HR will be able to influence the managing behaviour.

This has resulted in a variety of perspectives amongst interviewees about who should lead the agility programme. While some participants suggested that an agility programme should be led from the HR department, the other group argued that it is the responsibility of leaders, rather than HR, to lead the agility programme. It is because they believe that the traditional administrative HR does not have sufficient knowledge of the workforce and business needs.

A strategic consultant from Company 4 (Real Estate) had a similar view about HR as being anti-agility in many ways due to the considerable focus on implementing rules, controls and standards. Thus, he believes HR is not a place to lead and manage agility. When asked 'if it is not HR, so, who should be responsible for foster the agility mindset and behaviours?' he replied "it's leadership":

...The traditional role of HR can actually be detrimental to agility. I think agility is about a mind-set where people take responsibility themselves and I think in the past the HR role has been a way of. And a lot of HR practice in the past has been around control, you can't do this because, we're trying to get compliance, to get everybody to do the same, all this stuff is totally anti-agility in my mind... It's leadership really. I think the leadership needs to understand that to be really agile requires enabling your people to have more autonomy and more ability to influence, It's about those self-motivated teams, self-managed teams, So, the leadership becomes more of a coach and the managers become more coaches and facilitators, rather than actually talking about control.

4.4.2 Developing 'Workforce Agility Capabilities'

Developing agile workforce appeared as one of the fundamental roles of HR in agility development. A synthesis of the findings indicates that HR should focus on two important tasks: 1) Developing a human capital pool possessing a broad repertoire of skills, knowledge and behaviours, 2) Promoting an agility-oriented mindset and behaviours. In order to remain consistent with the terminology used in the literature, the combinations of skills, knowledge, mindset and behaviours required for agility are called 'workforce agility capabilities'.

HR, in order to quickly respond to the unprecedented challenges and changing requirements of the business, need to ensure that various combinations and configurations of workforce capabilities can be achieved to take advantage of emerging situations or to

overcome the arising threats. To quickly and easily achieve the various combinations and configurations of workforce capabilities, HR needs to develop a human capital pool possessing a broad repertoire of skills, knowledge and behaviours.

Company 8 (Aerospace), which is known for its high-performance engineering and innovative technologies, believe that their dynamic HR team plays critical roles in creating their agility by investing heavily in attracting, developing and retaining great people through the application of highly effective practices in areas of employee relations, resourcing, learning and development, and reward and recognitions.

The talent manager from Company 10 (Food) suggested that HR can support agility by crafting an HR strategy that plans for recruiting adaptable people with the right mindset, making them feel valued and developed, and retaining them long term. She reported how their HR strategy develop a human capital pool possessing agility capabilities following two components- Find and Love elements:

Our HR strategy is quite simple, it's about finding the best people and making them feel valued and developed, and then retaining them long term. So that's around a combination of having some good strategies around recruiting the right people, but also not just recruiting them from other companies but developing our own talent pool through graduate programmes, apprenticeship schemes, but also finding people in our business who have maybe not had the opportunity before, not realised that they can progress, encouraging them to progress, so that's the find bit. And then the love bit in the middle is the work we do on training and development, academies, career progression, performance management and potential. And then the keep bit is around engagement, so it's around things like employee surveys, and action plans to make sure that we hear their voices. But also, things like reward packages, so making sure that we're being competitive in the market place, and that people feel like they've got a long term future and that they've got job security... So all of those things sort of come together, and that's really very simply our HR plan.

Similarly, the HR director from Company 7 (Instruments Manufacturer) suggested that HR can make a meaningful contribution to an organisation's success at agility creation by creating an HR system that promotes the desired competencies for agility:

As HR we can play a fundamental role by the way we manage people, and the resources we put in place to enable people to do their jobs. And it's the type of competencies that we support in the organisation, in giving people, trusting people to be able to make the change, giving them the ability to be able to make decisions, having a relatively flat chain of command so it doesn't take long to have a decision made, that we allow risk taking to enable innovation. And we also need to educate our employees so they understand the business and so they've got an appetite to learn

about it. And through that then, understanding the business, our employees should know what is mission critical and why they need to turn around and why we need to be fast in the market. And in our annual appraisal processes and the way we manage, we promote those sorts of competencies and we want our employees to be quick thinkers and be action oriented.

HR might decide to obtain the broad repertoire of skills in two different ways: by having a fewer number of multi-skilled employees, who acquire a broad range of skills (generalist), or by hiring a larger number of individuals who have narrow but special sets of skills (specialist) and deploy and redeploy them across different projects and tasks wherever their skills are required.

Adopting the generalist approach necessitates having individual employees with broad sets of skills, knowledge and experiences to be able to assume multiple roles and tasks and to quickly move between assignments and perform in different capacities across different levels, and projects even external organisational boundaries. For instance, Council 1 has followed the generalist approach as reported by the senior HR manager. The austerity pressures made the council go through major organisational restructures which included reducing thousands of job descriptions and making them more generic. They created more flexible roles at all levels, from the front line roles through to the managerial and leadership roles. The roles are being reviewed on an ongoing basis to make these broader, less specific, and more generic and constantly consistent with the changing strategic directions of the council.

Alongside the reduction in job descriptions and defining the job families, they have introduced what they call 'Birmingham Contract' with a 'mobility clause' in the contract. The Birmingham contract, and its mobility clause, has been a mechanism to move staff across the organisation, aiming at removing a lot of practices that were specific to particular roles or particular jobs and making the workforce more mobile and flexible. The only exception is where the nature of the business that they deliver necessitates a particular specialism within a role.

Similarly, the talent manager at Company 10 (Food) outlined that agile organisations need to recruit people who potentially have transferable skills, people who could be multi-skilled rather than single processed, so that they will be more flexible in deploying different roles, and filling a number of potential future roles. She reported that they follow

these principles during their recruitment process.

Of equal importance, in developing an agile workforce is the promotion of flexibility and adaptive behaviours among the workforce. The findings from interviews suggests that HR teams and managers should ensure that employees in addition to the wide range of skills, possess a positive attitude and mindset to the changes, and have flexible and adaptive behaviours to rapidly redeploy different roles. These groups of attributes were introduced and discussed in previous sections (see section 4.3 Agile People Attributes).

Another common theme emerging from data, in relation to the workforce agility capabilities, is the need for an on going assessment of roles and the competencies needs. HR needs to ensure that the existing workforce capabilities can accommodate the current and future requirements of the business. So that, HR needs to continually evaluate the necessary workforce capabilities in light of strategic directions, and ensure their compatibility. This ensures that necessary competencies are identified and developed in a timely manner and skill obsolescence are avoided.

The participants explained that they ensure speedy identification and development of necessary competencies happen through continuous performance appraisals and regular performance conversations between managers and staff. These provide them opportunities to identify learning and development needs, and accommodate capabilities gap through training, mentoring, coaching, empowering and one to one support. (See section 5.5 for further detail).

Moreover, they facilitate speedy renewal and (re)configuration of workforce capabilities, through: the development of agile talent management strategies with a variety of talent acquisition strategies, development of workforce plans based on accurate workforce data and human capital metrics, continuous recruiting, and ensuring that employees are motivated and empowered to accommodate the fast and easy renewal and re-configurations of their competencies and to manifest the required agile behaviours. (See section 5.4 for further detail).

For instance, Company 8 (Aerospace) conducts a continuous recruiting procedure as opposed to episodic recruiting in order to ensure that a diverse range of different skills and competencies including leadership, engineering, operations, and customer facing and

commercial roles are always available in the workforce. The company attracts and hires both experienced and entry level talent. Therefore, they use broad recruiting sources by spreading their recruitment net across industry, universities and colleges.

At Council 1, they have tried to link workforce planning into the changing shape of the organisation, by improving the degree of workforce data and information. It provides human capital metrics which can be utilised in making quick and informed business decisions in relation to staffing, workforce alignment and mobility, and the provision of the necessary skills, knowledge and behaviours.

A senior director from Company 6 (Law) criticised the reactive nature of their recruitment as an issue in achieving compatible workforce capabilities with the business need. He argued for the need for capacity and capability management, and ongoing recruitment, as opposed to traditional episodic recruitment, which proactively hires people for possible future assignments.

In summary, four factors associated with developing agile workforce are identified from findings:

- 1- Speedy identification and development of necessary competencies
- 2- Speedy renewal of competencies to avoid skill obsolescence
- 3- Fast configuration and re-configuration of these competencies
- 4- Motivating and empowering employees to accommodate the fast and easy renewal of competencies and re-configurations and overall manifestation of agile behaviours.

4.4.3 Fostering Agile Culture

The previous sections identified the supportive organisational culture for agility, and the mindset and behaviours that agile organisations need to develop among their workforce. The findings also suggest that creating an organisational culture that values, recognises, rewards and enhances the behaviours required for organisational agility is the most important step in creating agility.

The next practical questions are: How to change culture or create such a culture? Who is responsible for cultural change? HR or leaders? The research results provided support for the importance of the HRM role in creating and maintaining an organisational culture that

facilitates agility. However, the results were mixed. The following section presents the findings associated with these questions:

The HR manager at Company 9 (Automotive) suggested that they have done their cultural change by leadership and by creating an inclusive environment where employees feel engaged and recognised in two-way communication processes where they can freely share their suggestions and concerns:

You do it (cultural change) by leadership, you do it by having a presence and doing the correct thing...there also has to be some collaboration and some communication between the parties, then there's recognition and celebration, saying to people well done, congratulations... we celebrate with the people as well and give them constant feedback that actually you are being successful. And that's the shift for me from where we've come. 'Cos you used to come to work and people used to say do this, do this, do this. And there's an automatic resistance of how far do I go. Whereas now, we're quite inclusive, we get quite an open plan for people to come back to us and make suggestions and be involved and lead and all of those things.

In contrast, the talent manager from Company 10 (Food) suggested that developing organisational culture that supports agility is the mutual responsibility of HR and leaders. HR should put processes in place and support people and leaders by appropriate development programmes, while leaders should lead the changes and engage the rest of the organisation:

I think it's half and half responsibility of HR and leadership. It's our (HR) responsibility to put processes in place and particularly from my point of view in an L&D capacity, to put together some development programme to help people in that area. I also think there's a responsibility of the leadership of the organisation, it's not just HR, about engaging the rest of the organisation in being as adaptive and responsive., HR's responsibility is to enable and facilitate that, but the leadership to role model that...

She added that HR, in order to support the culture of agility, should work with line managers to make sure that they feel supported and are able to communicate the right messages to their teams. HR should be the role models for change, being able to understand what's going on, communicate that to other people, as well as being able to adapt to that. She argued that it is not possible to expect the workforce to change and adapt, when HR is not prepared to do it itself.

The managing director of Company 12 (Electrical Manufacturer) suggested that changing people's attitudes and behaviours is a function of the quality and effectiveness of the

leadership. Thus, cultural change is very much driven by a leadership. HR's responsibility is to maintain the established agile culture by recruiting people who have agile attributes and can fit within the culture. In particular, HR needs to make sure that the new leaders understand what the agile culture is and to lead accordingly. He also outlined the importance of learning and education, communication, leading by example, and understanding the reasons for resistance.

4.4.4 Creating an Environment Which Facilitate Agility Development

The interview findings indicate that HR in order to facilitate agility, needs to create a facilitative environment and an organisational context that support agility. As Table 4.5 shows, this role has two dimensions: 1) Developing leadership; 2) Aligning the various components of organisational infrastructures and systems with the requirements of agility.

For instance, the head of business transformation from Company 3 (Multi- businesses) suggested:

HR play a huge role in any business agility, HR have to provide the environment that supports what this needs, it has to provide an environment where management have the tools to manage their people effectively, to manage their resource, their talent, their calibre, their capability, and we expect HR to be on the right side of leading edge and to understand how business works and develops and as a key part of infrastructures by which an organisation moves and becomes successful.

A strategic consultant from Company 4 (Real Estate) argued that HR can contribute in fostering the agile culture by developing leadership and putting the desire set of values for agility at the heart of management and leadership practices. He outlined the following roles for HR:

- Developing and educating the leadership
- Creating a framework to enable autonomy and self-management and facilitate agility
- Creating a sense of purpose for the organisation
- Facilitating the development of team dynamics as a business partner coach

Similarly, the managing director of Company 12 (Electrical Manufacturer) argued that it is not HR's job to deliver an agility programme, but to support and empower managers to run it. HR's job is to give employees and managers the skills and tools which facilitate the transformations:

HR doesn't run it (agility) so they don't provide the leadership, what HR can do is they can facilitate the change, they can facilitate the environment, and they can act as an enabler. But it must come from the leadership and the shop floor, because they're the ones who are going to be living with it hour by hour, day by day, and they're the ones who have to set the example. Now culture change comes from leadership, it's the leader that initiates the culture change, and it's the leader that sustains a different culture.

In terms of aligning the various components of organisational infrastructures with the requirements of agility, the following themes have been identified:

- **Moving away from hierarchical structures to a fluid, flat or matrix structure with 'semi-autonomous' or 'self-directed' teams.**

Crocitto and Youssef (2003) suggest that a major implication of agility is to break from traditional hierarchies and to develop a new approach to employer-employee relationships. Similarly, a senior HR manager at Council 1 stated that an agile organisation is the organisation that is flat in its structure, and has moved away from the traditional hierarchical way of operating. He argued that the important aspect of the structure is how the hierarchy operates since by the nature of any organisation there is some sort of hierarchal format:

I think an organisation structure is appropriate to agility that allows empowering, that is creative, that invites ideas, that doesn't operate by fear. That is challenging in a positive way and that incentivises I think is a way forward... I think it's that engagement, but I think more importantly an organisation that listens... The flat structures, listening and utilising the creativity and ideas that are out there with individuals. So either removes or as much removal of bureaucracy as you could possibly get...

Similarly, the agile working programme manager at Council 1 argued that a flatter structure is more supportive for organisational agility:

It's definitely not hierarchical, it's definitely more flat, and I think it reflects probably more focus on business service objectives and softer elements that are not traditionally picked up.

In the same way, a participating agility consultant advocated a flatter structure which in his opinion is more enabling for agility:

You've got to have strong leadership in most organisations, whether it's hierarchical or flat, quite often these days you're looking for a flatter organisation because flatter means quicker, more agile response, and more focus on the value of the individual

rather than working through some kind of hierarchical chain which does often bring time penalties, bureaucratic penalties, and loss of understanding and decision making is much less slower in organisations than it is in more bureaucratic.

- **Open communication: creating a climate of open and two-way communication with clear communication mechanisms and reporting structure**

The findings suggest that communication plays a very important role in promoting employee engagement and achieving workforce agility. Having a clear organisational structure and communication framework is essential for creating workforce agility. It has been identified that some organisational structures facilitate communication more than others. Further details about the characteristics of communication practices in organisations attempting to create agility are provided in the next chapter (see section 5.9).

- **Knowledge/information sharing: providing a seamless flow of information, ensuring information and knowledge are shared across the business quickly and effectively and providing inputs for quick and accurate decision making**

HR and managers should encourage employees to share their knowledge, information and suggestions on different matters. The knowledge sharing processes should be designed in a way that ensures that information and knowledge are shared across the business quickly and effectively.

- **Encourage utilisation of an adaptable workplace design**

One of the key elements that a majority of participants argued played a part in the promotion of effective communication and collaboration, is a borderless workplace with an open architecture. An ‘Agile Workplace’, as it is called by participants, eliminates organisational borders and gives employees a greater chance to communicate, share information and knowledge and to collaborate.

4.4.5 Creating an Agile HR Function

Although HR needs to become more strategic and business-driven, administrative operations are still a vital part of HR. Efficient operational systems are necessary for having an agile HR function. So, HR needs to build agility into the HR operations as well. The next section will present findings about the requirements of an agile HR function.

4.5 Building Agility into the HR Function: Reviewing the Structure of the HR Function

This section identifies conditions that need to exist within an HR function in order for it to be able to make contributions as indicated in the previous section. It answers the research question number four which is:

RQ4: What are the characteristics of an agile HR function?

To address this question, the participants were asked a series of questions including how their HR models have changed along with their agility programmes. They were also asked to provide information about any HR technologies and software systems which has brought agility into their HR functions by facilitating predictive decision-making for line managers and HR professionals.

The findings indicated that HR, in order to effectively play the combination of the identified roles in agility development, must be agile itself. This necessitates a series of characteristics and competencies in HR function. The findings from interviews identified three main components of an agile HR function including highly capable HR professionals with agile attributes, agile and flexible HR structures and work models, agile HR processes and operational system and efficient HR technologies.

4.5.1 Highly Capable HR Professionals with Agile Attributes

The head of business transformation from Company 3 (Multi- Businesses) identified two main requirements for HR in the context of agility; having a good portfolio of competencies, and understanding how the business works:

What enables HR to contribute in an agility transformation, are two things that are really important: first HR has a good portfolio of competencies to contribute, and second crucially understands the business well. So, if, for example, the business should change, then HR can draw on good organisational design changes, it can draw on good management practices to create that management robustness around engaging talent and performance... Crucially it's important that HR understands how the business works and how to put solutions at the table at the right time... So HR needs to anticipate what may be going on in the business and bring together the right interventions.

At the level of individuals, insights from interviews at Council 1 posit a series of skill and competency needs for HR professionals against a backdrop of agility. For instance, the senior HR manager at Council 1 argued that HR professionals should have knowledge of the business including strategy, technology and other business functions:

And HR need to be clear about what business we're in, so that they understand what the manager's having to deal with, what they need to deliver, and how to best help them to deliver that. working in a local authority, how can we deliver the best service to the citizens of Birmingham and what are those challenges out there, such as financial challenges, political issues, and the issues for the citizens of Birmingham. HR needs to understand all of that and then make sure that it's got the tools and the tools and the mechanisms to do that, talk the language of the business, not the language of HR.

He also added that HR professionals should be able to help the business to improve, innovate and respond to changes. Therefore, they themselves need to be creative, intelligent, and willing to learn new things:

So, they need to be looking outside the organisation to see what's going on in the business environment, to see what's happening in the world of academia, and to see what's happening in the world of other organisations and learn from that and bring that into the organisation, but for it to be able to chew apart and see how it can use that to help it.

When the HR manager of Company 9 (Automotive) was asked about the implication of agility for HR professionals, he explained:

the only bit of advice I could give anyone in a HR role is to understand the business, put your shoes on, put your glasses on and go and talk to people, go and understand what you make, go and understand why you make it, because that's the only way then that you can actually get close to the issues of the business. From an agility perspective, it is beneficial that people from within the business move into HR roles.

4.5.2 Agile and Flexible HR Structures and Work Models

The Ulrich's Business Partner Model has been widely applied by both local government service organisations such as Council 1 and Council 4 as well as private sector companies such as Co-operative, Company 1 (Telecom), Company 2 (Banking), Company 9 (Automotive) and Company 8 (Aerospace). The model has been regarded by the majority

of the participants as beneficial to organisational agility and a suitable structure for agile HR function. Since, it enables HR to make the contribution required for agility creation.

The senior HR manager at Council 1 pointed out that the new HR structure has led to strategic and proactive HR approaches towards its business needs and internal and external environment. Senior HR professionals are now able to spend more time on business critical issues, because the HR process standardisation and automation through SAP system have reduced the proportion of their time which used to be spent on administrative activities or giving operational support to line managers. As a result, they have been able to work on the exploitation of agility capabilities such as flexibility, innovation, creativity, quality and profitability:

The HR function previously was very operational and very silo focused. What you have got now is a HR function that's developing more of a strategic view. So for example the area that I work in tends to be predominantly strategic in its look and we work both with a lot of outside organisations, such as the universities etc, so we try to understand what's going on in the outside world and bring that back into the organisation. That can create conflict, challenge, ideas, and innovation, to do that. So things like the Lean Six Sigma has been as a result of what we've brought into the organisation, so we've been a driver in bringing that in.

The new centralised HR structure requires far less overhead than the previous decentralised model in which there was much duplication in HR functions. Therefore, a reduction in HR operating costs is a measureable advantage of the new model. A middle manager from Council 1 also added that the new model led to consistency in the delivery of HR services. The new HR model gives opportunity to line managers to make decisions more locally while it gives HR professionals more time to develop leadership skills and managerial competencies in managers.

Similarly, at Council 4, HR has been restructured and the Ulrich's model has been applied. The OD business partner detailed the HR transformation journey and how they have moved from a 'paternalistic approach' into a 'strategic business partner'. She outlined that the new HR model is more supportive in preparing the organisation for its future needs and responding to changes, and also how it reduced bureaucracy and revised many HR policies to make them more supportive in managing performance. His statements and similar reports from other participating organisations are not provided here in order to shorten the discussion.

Beatty (2005) reports that in pursuit of HR agility and refocusing the HR function on strategic tasks, many companies outsource the tasks which are predominantly tactical and usually owned by the HR function. The view of the managing director of Company 12 (Electrical Manufacturer) about outsourcing was as follow:

I do think that in developing a culture change, it's essential that the day to day people management aspect is handled by the people who are going to be managing that group, so in other words the operations team. I don't think tactical level can be outsourced really easily. Because to develop that, that capability, that agility, you need to develop a confidence of the people, you need to develop the engagement of the people, and that can't be handled by an external entity, it must be handled by the group that's going to work with those people to develop and then run and then drive improvement on the system or the mechanism or whatever implementation they're trying to achieve. But there are some pure admin activities that can be outsourced such as payroll, legal advice, or employment advice.

HR manager at Company 9 (Automotive) reinforced this view by suggesting that only some of the HR activities are suitable for outsourcing:

If it's pure activity, it is suitable to be outsourced. Such as payroll. For the people aspects and the one to ones, outsourcing a whole HR department for me doesn't work, because to benefit the business you need to be close to the business and close to the managers, in order to help the process.

4.5.3 Agile HR Processes and Operational System and Efficient HR Technologies

The previous sections show that as companies become more agile, they have transformed from a traditional HR structure into a more strategic, agile and business-integrated HR. The new HR systems are centrally integrated, while operated locally through business-driven and skilled HR business partners. The findings show that HR self- service technologies play a fundamental role in transforming into this model. All the participants who have applied the business partnering models or na HR structure with a central shared service use integrated self-service technologies.

For instance, Council 1 uses the SAP system which supports the manager self service, employee self service and centralisation. Running alongside SAP, they use the Voyager financial system which is a SAP-based software. In fact, they have been on the SAP system for about five or six years. So, they are now trying to have a better understanding of what SAP can and cannot do for them. For instance, they have a rich source of data on SAP, but sometimes SAP is a bit problematic in extracting data and getting knowledge out

of information.

They are currently looking at some software packages that can draw SAP data out and be better at manipulating it to give them a greater understanding. The senior HR manager at Council 1 highlighted the importance of utilising technology for providing them with the centralised workforce data they require for understanding skills and capabilities, staffing and talent management. However, while he argued that the application of HR technology is essential in bringing agility to people management, he asserted that HR teams need to fully understand their issues before utilising any technology:

...So the solution is probably technology but we need to properly understand what we want to do, and there's a danger that you end up with the tail wagging the dog and you go for a technology thinking it's going to magically answer all your issues and it's not, you need to understand what your issues are, what you want to do, and then see if there's any particular software that will help you with that. So we're in that sort of zone at the moment.

Company 2 (Banking) as reported by a HR leader has similar HR self- service technologies which are highly integrated and provide the necessary information for a quick and data-driven decision making:

We have a kind of HR portal technology, which integrates everything. So if a manager wants to update someone's absence records, they would just go into that portal and that gives them automatic access into the manager self service facility, so managers can actually update the system. Same for employee self-service, I can keep all my own personnel records up to date, if I change my address, move house that type of thing. So it is all pretty much integrated now. There are probably still a few exceptions. Learning's still got a segmented learning structure. By the end of this year it will all be one system, one learning management system, which all of our learning teams are working very hard on at the moment to launch.

Similarly, the talent manager at Company 10 (Food) highlighted the importance of an integrated HR technology in enabling a quick and data-driven decision making:

We're now implementing an HR system that will not only provide us with one database, that will enable us to use our appraisals online, We'll also have a training module on there, which will enable us to do some work on training needs analysis and feed that through into a training module and generate some training needs and manage our courses that way. It will give us much better access to the information, so we can actually spend more time analysing the information and using that to make better decisions about what the needs of the workforce are and how we might want to respond.

4.6 Summary of the Chapter

Chapter Four presented the findings associated with the research questions number one, two, three and four. In summary:

1. As the main focus of this study is on people aspects of agility, the general information about the organisations' background, their definitions of agility and their agility drivers are presented in the form of tables to shorten the discussions. A summarised background of the participating organisations is provided in Appendix C. The perception of the participating organisations about the concept of agility were studied and presented in Table 4.1. Agility drivers - the pressures and circumstances in the companies' business environment which have resulted in a need for agility creation and adopting new business or HR strategies, were identified and are summarised in Table 4.2.
2. The critical role of organisational culture in achieving agility is studied. The particular characteristics of organisational culture and shared values that were perceived by the participants as supportive in creating organisational agility were identified and are summarised in table 4.3.
3. The perception of the participants about agility at the individual level, were studied. The distinctive characteristics and attributes of people which are central to achieving agility were identified and are summarised in table 4.4. These included the mindset, behaviours and skills that are expected to be developed at the individual level in order to create and sustain agility.
4. The contributions that HRM can make in agility creation were studied.
 - 4.1. The research results provided support for the importance of HRM role in creating and maintaining an organisational culture that facilitates agility. However, the results were mixed. Some interviewees argued that developing an organisational culture that supports agility is the mutual responsibility of HR and leaders, while others argued that cultural change is very much managed and driven by leadership.
 - 4.2. Some participants argued that traditional HR functions which focus heavily on administrative tasks and enforcing standards and compliance, cannot meet the requirements of agile organisations as they are anti-agility in many ways due to the considerable focus on implementing rules, controls and standards.

- 4.3. Consequently, a variety of perspectives were expressed about who should lead the agility programme. While some participants suggested that an agility programme should be led from the HR department, the other group argued that it is the responsibility of leaders, rather than HR, to lead the agility programme. It is because they believe that traditional HR does not have a sufficient knowledge of the workforce and business needs.
- 4.4. A common view amongst interviewees was that HR, in order to contribute to organisational agility, needs to be strategic. The majority of participating organisations have changed the purpose, roles and structure of their HR in order to foster agility.
- 4.5. A series of roles and responsibilities were identified for HR in order to make a meaningful contribution in agility creation. These can be found in Table 4.5.
- 4.6. Some specific skill and competency needs for HR professionals against a backdrop of agility were identified.
5. The conditions that need to exist within an HR function in order for it to be able to make contributions in agility creation were identified. These include the supporting HR structures and models applied by the participating organisations, and HR self-service technologies which facilitate the application of such structures.
- 5.1. The Ulrich's Business Partner Model has been applied and regarded by the majority of the participants as a suitable HR structure for agility development. Since, it enables HR to make the contribution required for agility creation. The application of the model and the associated benefits and issues were presented in section 4.5.2.
- 5.2. The importance, characteristics and benefits of the HR self-service technologies were identified and presented in section 4.5.3.

The findings from this chapter and Chapter Five will be integrated to modify the conceptual framework for an agility-oriented HR strategy which will be discussed in Chapter Seven.

CHAPTER FIVE
PRESENTATION OF FINDINGS
HR Practices for Organisational Agility

5.1 Introduction

The aim of this chapter is to provide an overview of the HRM practices adopted by the participating companies and perceived as supportive in creating agility and developing workforce agility capabilities. The entire chapter presents the findings associated with research question five.

RQ 5: What HR practices are being used by organisations and are perceived as effective in achieving organisational and workforce agility?

A series of agility-oriented HR practices which were deployed and perceived by the participating companies as having the greatest effect on organisational agility and the creation of workforce agility capabilities are identified and classified into nine major areas of HR including work design; learning and development; performance management; staffing; talent management; employee engagement; empowerment; communication; and rewards and recognition.

The research findings indicated a series of distinctive characteristics for HR practices in organisations trying to create agility. The chapter is organised around the nine major areas of HR, introducing the identified characteristics of AOHR practices along with the major themes that emerged from analysis of interview data. To shorten the discussions, a summary of the key findings in relation to each HR area will be presented in the form of tables, following by a limited selection of participants' statements on each topic.

The results also indicate that the last four domains of practice, which particularly deal with employee engagement and motivation-i.e. employee engagement, empowerment, communication, and rewards and recognition, have the greatest impact on promoting AO mindset and behaviours. These practices, built on top of the foundation of the first five groups of HR practices, significantly contribute to the development of workforce agility capabilities, when all of the nine groups of practices are aligned horizontally and collectively aimed at developing a broad repertoire of skills and knowledge and fostering agility mindsets and behaviours.

5.2 Work Design

Findings from the participating organisations suggest that HR should be prepared to rapidly move people between functions and even across organisational borders and to redeploy and release them as business needs fluctuate. The participants recommended a flexible work design and a dynamic career model which allows more flexibility in approaches to talent deployment and internal movement. Table 5.1 provides a summary of the findings in this regard, showing the characteristics of work design in organisations attempting to create agility.

Table 5.1: Characteristics of work design in organisations attempting to create agility- summary of the findings

Work Design
Work design is based on a fluid and flexible job description that allows people to freely deploy and redeploy roles
Work design gives individuals discretion and responsibility over how to meet customer requirements and how to achieve their targets most effectively
Roles are defined in a way that people have freedom over how to deal with certain situations, so that they are well positioned to manifest agile behaviours.
Works are designed/redesigned by the individual and self-managed autonomous teams who set their own goals. The process of defining detailed job descriptions and individuals' objectives are dealt with at a team level rather than by management on top or the HR department.
People are involved in cross-functional, reconfigurable multi-functional teams through which works are performed.
People are assigned to different projects based on their skills rather than assigning them functionally.
Different forms of practices such as flexible assignment, job rotation and secondment are deployed to cross-train and move people between different functions, projects and tasks. These practices highly develop employees' skill repertoire and improve their retention.
The agile working approach, the notion of working anytime, anyplace, and anywhere, is widely deployed. It assimilates different flexible and adaptive practices across two dimensions of time and location, to integrate people, property and technology to establish the optimal workforce and broaden the talent pool.
Detailed, prescriptive and fixed job descriptions are inhibitive to agility as they constrain people from being adaptive, assuming multiple roles and collaborating cross-functionally

The participating organisations apply different forms of flexible work design practices which can be classified along three dimensions of role, time and location as follows:

- **Role:** what do people do? (Such as job rotation, flexi-teams, multi-skilling, secondments)
- **Time:** when work is undertaken? (Such as shift-work, part-time, flexible hours)
- **Location:** where people work? (Such as home working, remote working ...)

This section firstly presents the findings around the ‘role’ dimension. Then a separate section, named agile working, provides the findings around the other two dimensions; time and location.

5.2.1 Flexible Job Profiles (Role Aspects)

The Managing Director of Company 12 (Electrical Manufacturer) argued that detailed, prescriptive and fixed job descriptions which ask people to follow the rules are inhibitive to agility:

The more specific, the more detailed the job description, the more it will constrain people to operate in a certain way... it would slow things down and reduce the ability or the organisation to respond, because the employees were working exactly to what the letter said...if you want agility; you want people who can deal with whatever the customers want.

By contrast, he argued agility needs a fluid and flexible job description that allows people to freely deploy and redeploy roles, and gives them discretion over how to meet customers’ requirements and how to achieve their targets most effectively:

If you need agility, the job design is one line, do what is required to meet the customer, to improve quality, whatever the target is, but its do what is necessary. And with agility you don’t want people to necessarily operate the same way all the time, you want them to think outside the box, to look at the span of resources and the time slots available to them... and make the decision to achieve what they’re trying to achieve most effectively within that. So it’s pushing on to the individual a degree of responsibility to think through what’s going to be the best way to deal with a particular issue, given the constraints that they’re operating in, rather than being very prescriptive.

In the same way, the HR director of Company 7 (Instruments Manufacturer) suggested that a detailed and narrowly scoped job description is an inhibitor to agility, as it constrains people to be adaptive, assume multiple roles and to collaborate cross-functionally.

Similarly, a strategic consultant from Company 4 (Real Estate) argued that the traditional way of defining roles with detailed tasks does not work for agility. He suggested that roles should be defined broadly and the work should be designed and performed by self-

managed autonomous teams which set their own goals. Thus, teams are responsible for the designing and redesigning of tasks. Consequently, the process of defining detailed job descriptions and individuals' objectives should be dealt with at a team level.

A participant from Company 8 (Aerospace) reported that at their company, roles are defined in a way that people have freedom over how to deal with certain situations. Having that freedom, they are expected to manifest agile behaviours. This is consistent with the company's share value and is integrated with a performance management system where people will be assessed upon those behaviours.

A number of participating organisations reported that their people are involved in cross-functional, reconfigurable multi-functional teams through which works are performed. For instance, at Company 8 (Aerospace), people are involved in different integrated product teams (IPTs) which are groups of individuals from cross-functional areas, with diverse backgrounds and various skills sets, who focus on a programme or project. The participant from Company 8 (Aerospace) reported:

There are different integrated product teams, IPTs, and in each IPT, depending on what they're working on or what the task is, there are people from different skills sets... there is a representation from cross-functional areas in order to have a more robust team... it's definitely important to have people from diversified skills, I also find that it is important to have people from diverse backgrounds as well in the same sort of way, because culturally everyone brings different aspects to a job...

Similarly, the HR director and a senior manager from Company 7 (Instruments Manufacturer) reported that they recruit people based on their skills and assign them to different projects which are changing over time, rather than assigning them functionally. Thus, employees are expected to collaborate with various multi-functional teams and perform different tasks within various projects. The senior manager reported:

The kind of products that we have, we always need a multi-functional team, so we always need a project team that's got electrical engineers, software engineers, mechanical designers, chemists, and biochemists, whatever. So they always come together in a functional team that exists for a year and then they go off...

Participating organisations which pursue agility commonly deploy different forms of fluid and flexible assignments. To achieve this, they require multi-functional individuals and teams who are cross-trained by job rotation and move between different functions, projects and tasks. For instance, the HR manager from Council 5 reported that they have just

introduced a job rotation policy which is called ‘moving people around’. They use it as a development opportunity for people who are interested in contributing to different projects and initiatives.

In the same way, the talent manager at Company 10 (Food) reported that they make sure that senior operators get job rotation, so that they learn how to do a full range of different processes. Similarly, Company 8 (Aerospace) pursues different forms of flexible work design practices including job rotation, secondments and flexi-teams to develop and retain multi-skilled employees. Likewise, a senior director from Company 6 (Law) advocated job rotation practice and secondments and reported that the practices have worked for them as a legal company as they have brought agility to their organisation.

A senior manager from Company 7 (Instruments Manufacturer), embarking upon his personal experience of performing more than seven different jobs in the first two years of his employment at Company 7 (Instruments Manufacturer), also advocated the job rotation practice and asserted that the practice is highly beneficial for both employees in terms of career progression and for organisations to increase workforce agility capabilities and fluidity.

In the same vein, the HR manager at Company 9 (Automotive) reported that they follow several practices that make them flexible across the workforce. These include job rotation, multi-skilling, shift work and overtime. In terms of improving the flexibility of workforce he explained:

We are able to move people around far more flexibly than having the demarcation lines of I just do janitor work, I just do clerical work. So on the shop floor, the box, everybody does everything, or has the ability to do everything. Which is really key from an output perspective, because in assembly line plants, they work based on RTO, Required To Operate... So what we have is we call it a 3 by 3 flexibility matrix. So three people should be able to run three machines...So, there is a learning curve as they go through... And your training programme over time is about all of those three people being able to run the whole of those machines.

5.2.2. Agile Working Approach

Searching for the work designs which support the creation of agility, *Agile Working (AW)* emerged as a widely deployed approach among 10 out of 17 participating organisations within local council and housing organisations as well as private service organisations.

The majority of participants defined agile working as the notion of working anytime, anyplace, and anywhere through any device. Agile working was also widely referred to as a ‘new way of working’ that may assimilate different flexible and adaptive practices to integrate people, property and technology to improve responsiveness to unpredictable changes. However, in order to be successful, it has been stressed that people should be provided by the tools, HR policies and workplace and technology infrastructures that support more flexible work styles.

It is reported that agile working enables organisations to establish the optimal workforce, broaden the talent pool, and create workforce agility so that the business can react much more quickly to the demands of the marketplace. According to the data, agile working embraces all potential practices including flexible working practices that provide opportunities for an organisation to improve the productivity, agility and flexibility of its workforce.

These practices can be classified into two main categories of time and location as shown in table 5.2. The time cluster in Table 5.2 shows the most common flexible working practices. The location cluster, which includes two sub-categories of remote working and office-based working, shows the options revolving around where people work.

Table 5.2: Agile working practices classification- extracted from interviews and companies’ agile working policies

Time	Location	
	Remote working	office-based working
Non-standard Hours	Mobile	Distributed workplace
Annualised hours	Home-working	Collaborative zones
Part-time working	Working across multiple sites	Team space
Parental rights	Renting work-hub desks	Mobile officing
Reduced hours	Virtual office	Free address
Flexi-time	e-work	Desk sharing, Hot-desking
Shift work	‘No office’	Touchdown
Compressed hours	Third places	Satellite hubs
Job share	Teleworking	Clients’ offices
Career breaks		
Staged retirement		

The participants outlined a series of benefits associated with the adoption of agile working. The key benefits are reported as:

- Better customer experience and easier access to services with new service delivery options

- Potential for new service delivery models
- Closer team working and collaboration
- Enhanced recruitment and retention
- Opportunity for greater customer contacts
- More productive/responsive service
- Improvement in workplaces and work styles
- Lower property operating costs and greater sustainability

More importantly, in relation to organisational agility, they reported that agile working enables them to provide customers with quicker responses and a more customised delivery of services. For instance, the participant from Company 1(Telecom) reported that agile working has had many benefits for employees, society in general and Company 1(Telecom). For Company 1(Telecom), it has reduced estate costs, increased productivity and enabled them to handle customer issues more immediately. The programme has led to a happier and more satisfied workforce as they are enjoying a better work-life balance. The overall sick leave has reduced and the company are very successful in retaining female talents following maternity leave. The *care agile survey* that they run twice a year indicated that people who are able to work in a more agile manner, show a higher score in terms of employee engagement. In particular, agile working has brought agility to their business as they have been able to seize market opportunities more quickly:

...The fact that we have the technology that will allow the people to work from a home office, meant that we were able to create employment opportunities in remote locations in the UK that would otherwise have been impossible. ...we're able to deploy growth strategies for example, so a really good example is, you've probably seen all the adverts recently on the Company sport services, well we have been recruiting literally thousands of people to be able to run that marketing and sales campaign. Because we have ready to go space, which we have cleared as part of our property strategy, we have been able to react to that at very very short notice.

5.3 Staffing

This section presents the findings pertaining to the subject of 'staffing'. It reviews how participating organisations have incorporated agile attributes in their selection criteria and recruitment process. The characteristics of staffing in organisations attempting to create agility are shown in Table 5.3:

Table 5.3: Characteristics of staffing in organisations attempting to create agility- summary of the findings

Selection criteria
Recruitment process and selection criteria search for people with agile attributes.
<p>The majority of participating organisations hire for attitude first then skills, because they believe they can develop employees’ skills, knowledge and experience over the time.</p> <p>However, some companies which produce highly complex products using high-tech manufacturing facilities or companies which face intense competition in attracting high-skilled engineers and scientists, they have to place high value first on candidates’ technical skill rather than following “<i>hire for attitude first</i>” principle.</p>
Access to workforce data provides accurate and meaningful business intelligence which is essential in making quick and informed business decisions.
Conduct competency-based interviews, whereby the candidates are assessed on technical competencies as well as behavioural competencies.
Recruitment Process
<p>Facing a challenging recruitment environment because of intense competition for talent, they invest significant resources in talent management to attract and develop talent. These include:</p> <p>Investing in employment branding</p> <p>Using broader recruiting sources such as social media to advertise their vacancies.</p> <p>Developing their own talent pipelines by introducing more apprenticeship programmes</p> <p>Conducting continuous recruiting processes as opposed to reactive recruiting to ensure a diverse range of experiences, mindsets and competencies are always available in the workforce.</p> <p>Mechanisms exist for internal hiring, so that information about position openings and career opportunities is widely shared internally</p>

5.3.1. Selection criteria and search for agile attributes

The majority of participants reported that they have changed their selection criteria and recruitment process as part of their agility programme to incorporate agile attributes. In addition, it is frequently suggested by participants that the hired employees should possess agile attributes foremost as they believe they can teach people the other necessary skills, knowledge and experience. For instance, the HR manager at Council 5 reported:

In order to develop agility mindset, we are starting to change our job descriptions so that it attracts people based on their attitudes and aptitudes rather than the technical ability, because there are certain technical things that you can teach people to do, but you can’t teach people to have the right attitudes or the right aptitudes.

Similarly, the talent manager from Company 10 (Food), the managing director of Company 12 (Electrical Manufacturer) and the HR manager at Company 9 (Automotive) stressed that they hire for attitude first then specific skills as skills can be learned but attitude is not necessarily learned. In particular, the managing director of Company 12 (Electrical Manufacturer) suggested that hiring people with agile attributes is necessary for maintaining an agility culture.

The HR director at Company 7 (Instruments Manufacturer) also reported that they search for agile attributes such as change ready mindset, quickness and innovativeness during their competency based interviews. However, as a technology company which faces intense competition in attracting highly-skilled engineers and scientists, they have to adopt a contrary view on the “*hire for attitude first*” principle. She explained as many skills are short, they have to place a high value firstly on candidates’ technical skill. They prefer to hire people who have experience of working in high dynamic industries, managing product development projects in a short lead time, with a similar sense of urgency demanding quickness and a high level of adaptability to changes:

... our job description will list the attributes that we would want the person to have. We use competency based interviews to search for those type of competencies. However, in some cases our managers who are interviewing, they value first the technical skills of the person, they place high reliance on their technical skill and the type of work that they have done, and the type of commercial environment they were in...

At Company 2 (Banking), as reported by a HR leader, recruitment and selection follows a competency-based approach consistently across the organisation, in which the applicants’ competencies and behaviours are evaluated during the interviews. Prior to the interview stage, they make sure that the applicants possess the necessary knowledge, skills and experience:

We’ve always had competency based. I mean when you apply for the role, every role will carry you need to have this type of knowledge, you may need to carry these type of skills, so to actually get your foot in the door for an interview you need to meet the criteria for a specific role. But then how you are selected against the other people who apply would all be down to your actual competency and behaviour, and why you’re kind of the right person for the job.

Similarly, the participant from Company 8 (Aerospace) reported that they conduct competency-based interviews, whereby the candidates are assessed on technical

competencies as well as behavioural competencies. So, evaluation of agility mindsets and behaviours is incorporated within their interviewing process. However, similar to Company 7 (Instruments Manufacturer), ‘hiring for attitude first and specific skill second’ is not always the case for them.

5.4 Talent Management

This part reports how participating organisations focus on talent management to attract, recruit, develop and retain talent. The key themes in relation to talent management in are shown in Table 5.4:

Table 5.4: Characteristics of talent management in organisations attempting to create agility- summary of the findings

Talent Management
<p>Facing a challenging recruitment environment because of intense competition for talent, they invest significant resources in talent management to attract, develop and retain talent. These include:</p> <ul style="list-style-type: none"> • Investing in employment branding • Using broader recruiting sources such as social media to advertise their vacancies. • Developing their own talent pipelines by introducing more apprenticeship programmes • Conducting continuous recruiting processes as opposed to reactive recruiting to ensure a diverse range of experiences, mindsets and competencies are always available in the workforce. • Utilising a range of employee retention programmes
<p>A range of <u>Employee Retention</u> interventions are applied including:</p> <ul style="list-style-type: none"> • Developing a flexible work model to ensure employees have a healthy work-life balance • Developing effective <u>Mobility Programme</u> which • Share and release talent between business units • Encourage employees to move within the organisation and switch roles • Support employees in developing their potential to the full, based on their career aspiration • Ensure that core employees have a development and progression path so that they can grow in their roles or progress towards another role • Mechanisms exist for internal hiring, so that information about position openings and career opportunities is widely shared internally

The findings suggest that organisations which pursue agility invest significant resources in talent management to attract, develop and retain talent. These include investing in

employment branding, using broader recruiting sources such as social media, developing their own talent pipelines by introducing more apprenticeship programmes, conducting continuous recruiting processes as opposed to reactive recruiting, and utilising a range of employee retention programmes.

For instance, the talent manager from 2sister Food Group outlined that they face an intense competition for talent especially in hiring people with a food science background. Thus, they started to invest in employment branding and to use broad recruiting sources by continuous socialisation on social media to advertise their vacancies:

We are starting to use more technology now, to use social media to advertise our vacancies. as well as advertising on job boards like Monster and things like that, we are also using things like Facebook, LinkedIn, Twitter, to communicate with potential talent, and to generate followers from student graduate population, job hunter, ... obviously if we've got a vacancy, we can put it out on the social media networks and that goes to a much wider audience, potentially to people who are specifically interested in the food industry rather than just a general audience.

Facing a challenging recruitment environment because of the skill shortage, they started to develop their own talent pipelines by introducing more apprenticeship programmes:

.. it's a challenging recruitment environment. Some of the skills in the food industry are quite specialised, and everybody's looking for people with food science background... we've taken on more engineering apprentices in the last few years to fill our own gap. we're trying to develop our own talent pipelines, whether it's from our internal employees or whether it's from actually developing our own sort of students and graduates through the business, from school or working with schools on encouraging the students to join the food industry. ...classically a lot of companies just try and recruit off each other, and that's where you get your war on...So we need to start topping up the talent pool from the younger end.

A strategic consultant from Company 4 (Real Estate) suggested that one way to broaden recruiting sources is where the recruitment process allows team members to find their own recruits:

In my experience, I've seen it in lots of businesses recently, you get really good team dynamics, and the team find their own recruits. And that works really really well... If a team growing organically, finding its own people and attracting effectively.

At Company 3 (Multi- businesses), the head of business transformation reported that they face intense competition for talent and recruiting skilled people, the same as other

businesses. She suggested that in response to this challenge, recruitment processes should support attracting a diversity of talent:

I think any business that says it doesn't have challenges with talent acquisition is not really reflective in the current situation. The key really is to make sure that the recruitment processes support attracting a diversity of talent and that managers are open to recognising what that diversity can do for the business, and really engaging and enabling it.

Similarly, Company 8 (Aerospace) conducts a continuous recruiting process as opposed to episodic recruiting in order to ensure that a diverse range of different skills and competencies including leadership, engineering, operations, and customer facing and commercial roles are always available in the workforce. The company attracts and hires both experienced and entry level talent. Therefore, they use broad recruiting sources by spreading their recruitment net across industry, universities and colleges.

A senior director from Company 6 (Law) reported that the company also has an effective mobility and development programme in place to support employees in developing their potential to the full, whatever their career aspiration is. The participant reported:

It is highly encouraged to move within the organisation and switch roles at least every two years inside the organisation. So nobody forces anyone to change roles, but depending on what kind of career path you choose, it's recommended to move from role to role. For instance, for people who prefer to choose a leadership or managerial career path, they need to have a more diversified experience in different functions, so that they can excel towards their desired roles, in which case it is highly recommended or encouraged to switch jobs within the organisation. However, for people who prefer to become specialised in their current roles, there are options available. ..., in which case, there is a different structure that they can progress into.

Likewise, the development and retention of talents is a priority at Company 3 (Multi-businesses). The head of business transformation reported that there are a range of talent programmes throughout the business in order to to grow, develop and retain talent:

There's a focus on graduates, and on learning and development and getting good performance development plans in place so that the talent grows and develops. It's just a smart way of engaging one of the biggest assets, as it's the people that make a real difference to the business, smart businesses actually make sure that they're engaged and retained effectively.

There is a range of talent mobility interventions for sharing and releasing talent between business units and for making sure that core employees have a development and

progression path so that they can grow in their roles or progress towards another role. Furthermore, at Company 3 (Multi- businesses), information about new vacancies and careers opportunities is widely shared internally partly through their internal social networks:

There are careers opportunities on our website externally, and internally there are normal career and job opportunity vacancies. We have social networks internally, we use it to advertise our careers opportunities but it's not structured enough to be hugely used for recruitment. We do use secondments, we try and make an informed decision around that, so are calibre analysis might recognise talent and to grow that talent we might choose to second someone elsewhere.

In the same way, Company 2 (Banking) has mobility programs to retain its skilled employees by moving them between business units and develop them by providing them with progression opportunities. Their internal online careers guide provides guidance for career planning. An HR leader at Company 2 (Banking) reported:

We do have a lot of mobility. We have an online, our own internal online kind of careers guide. It's very innovative in that you can sign up to alerts so you don't have to sift through. You can choose what type of criteria job you're looking for. Managers are fairly supportive of people moving round the organisation, but it is about then finding the opportunities and then pursuing them, rather than necessarily encroaching people.

Company 5 (Utilities) always advertises its career opportunities internally first. The performance management system is designed in a way that identifies the potential and career aspirations of each individual. Part of the mid-year performance review is that managers discuss the things individuals want to get from their role and career. Managers take in to account that potential is not just about promotion. Some employees want to stay and grow more in their current role by being involved with new tasks or experiencing new challenges. For others it could be about preparing themselves for future promotions. There is a performance rating matrix which combines achievements in performance outputs and behaviours and supports managers in assessing the employees' level of potential. It put people in four different groups according to their level of potential as shown in Table 5.5.

Table 5.5: The 4-box Performance and Potential Model at Company 5 (Utilities), source: Company 5 (Utilities)'s guide to manage performance: Page 13

Promotable
<ul style="list-style-type: none"> ● Consistently demonstrates many skills and behaviours required at the next level and has begun to demonstrate requirements for a promotion ● Regularly operates at a level beyond that required of their role. Shows high self-awareness and capacity for learning ● Has clearly articulated a desire to develop and progress their career, in addition to demonstrating high capability.
Can stretch
<ul style="list-style-type: none"> ● Has begun to demonstrate skills or behaviours required for a more stretching or future role, and demonstrates capacity for further learning ● Has not had the opportunity to demonstrate higher level skills or behaviours, but has demonstrated a capacity for further learning.
Can sustain same level of performance in role
<ul style="list-style-type: none"> ● Consistently demonstrates the skills and behaviours required at their level ● Regularly operates at the level required for their role and demonstrates the ability to develop as the demands of the role grow ● Current role is where they want to stay.
Unlikely to keep pace with change
<ul style="list-style-type: none"> ● Will struggle to keep pace and maintain acceptable performance levels in current role as the business adapts and moves forward ● Shows no signs of developing skills/behaviours required at the next level or for a future role, despite being given opportunity to demonstrate them ● May have demonstrated an inability to deal with change or act on feedback ● May demonstrate limited potential to develop ● Has chosen to deselect themselves from future development opportunities for personal reasons.

For those employees who are identified as promotable, ready for career movement, there is a succession planning process that includes these individuals where appropriate.

Mechanisms exist for informing HR about the strong internal candidates in order to link them to new vacancies.

5.5 Performance Management

Findings from the participating organisations suggest that performance management practices should reflect specific characteristics in organisations trying to create agility, which are summarised and shown in Table 5.6:

Table 5.6: Characteristics of performance management practices in organisations attempting to create agility-summary of the findings

Performance Management
Performance metrics (KPIs) include some measures that relate to agility
Performance expectations reflect desired workforce behaviours and shared values. Accordingly, goal-setting and performance measurement/review are about both what/how people deliver both KPIs and behaviours
Goal-setting is around common performance metrics that avoid conflicting functionally-oriented assessments
Performance system and goal-setting focus on individual contributions to team and organisational success
Performance system emphasizes contributions in outputs and outcomes rather than tasks and presenteeism
A continuous performance appraisal and employee feedback is developed: they revise goals more frequently and have regular conversation with employees to provide them with real-time and informal performance related positive or negative feedback.
Performance system is closely linked to talent management and learning and development, so it identifies learning opportunities and potentials in the short-term
Performance system is linked to pay and reward and recognition
Performance system encourages for positive peer review: in some cases, 360-degree reviews

The nine performance elements listed above have clearly been seen in the majority of the participating organisations. For instance, the performance management system at Company 5 (Utilities) links people’s performance and behaviours to the performance of the organisation. Managing performance includes regular open conversations between managers and their teams to ensure that every individual understands what is expected of them, knows how well they are doing and ensures appropriate development is in place to enable people to achieve their objectives. As Figure 5.1 shows, the goals and objectives focus on what needs to be achieved and must have a clear link to the company’s business goal, measured by KPIs. Behaviours focus on how individuals achieve their objectives. Both the behaviours and objectives are given real consideration when managers consider an overall performance rating. The company’s performance rating matrix looks at performance outputs and behaviours, combining the achievement in both areas to create one overall performance rating.

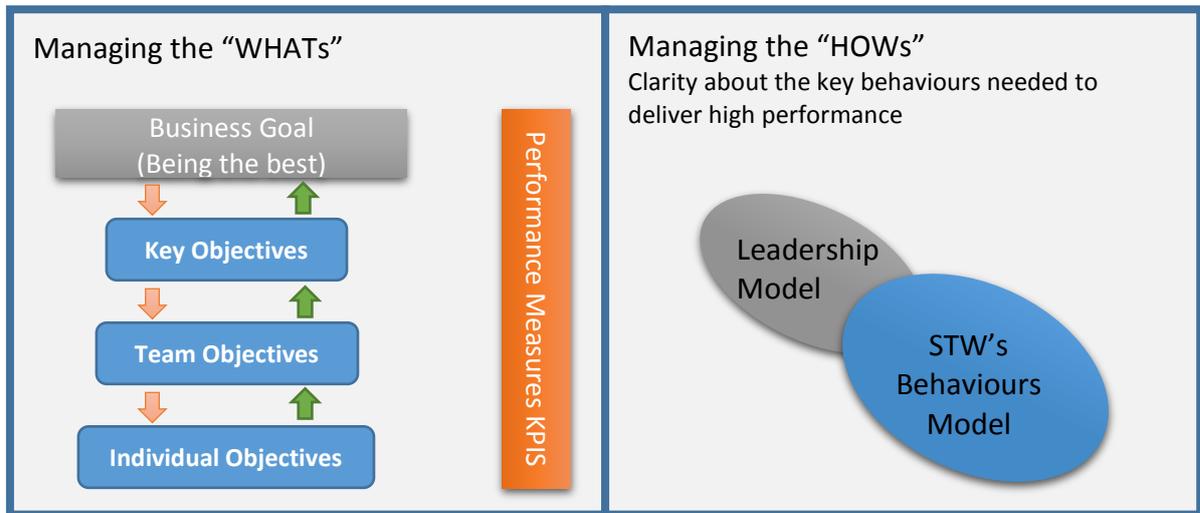


Figure 5.1: Goal-setting at Company 5 is about managing KPIs (Whats) and behaviours (Hows),

Source: Company 5 (Utilities)'s guide to manage performance, page 5

In addition, the STW's performance management process is based on regular one to one conversations during the year on agreed objectives, performance and behaviours. As Figure 5.2 shows, these conversations focus on sharing feedback, listening to each other, discussing role requirements including performance/behaviours, quality of work, development plans and reviewing progress in the achievement of objectives. Managers use the *managing performance record* to record information at key points through the year, but the emphasis is on regular conversations rather than form filling. The agreed SMART objectives are clearly targeted statements that can be measured and understood by employees and should have the following characteristics:

- Linked to business objectives and priorities
- About results not activities – focus on individual contributions to business
- Matched in terms of a person's experience and capability – they should take account of the individual's ability, experience, knowledge and development needs
- Updated when necessary – objectives may have to be changed during the year to reflect changes in business decisions that are outside the control of the individual
- Combined effectively with other objectives in the team/function/organisation – good objectives should not clash with other objectives

- **Balanced** – when agreeing objectives consider how balanced they are in terms of supporting business priorities and individual ambitions.

Objectives can also reflect changes in required behaviours based on a review against the relevant behaviours model.

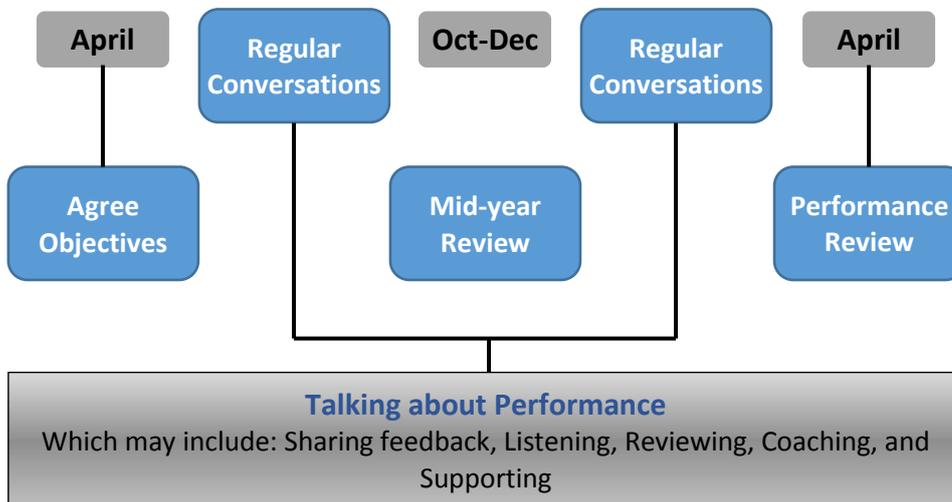


Figure 5.2: An Overview of the performance management process at Company 5, Source: Company 5 (Utilities)’s guide to manage performance, page 4

The regular discussions and the mid-year review are opportunities for managers to identify potential and career aspirations in their teams, so they can determine the appropriate development plans for each individual.

Council 1 revised its performance and development review process which is supported by the Council’s behavioural framework. As part of this, they have introduced performance development review process to all staff through which all managers can access their team’s performance management records and performance development review (PDRs) through the HR portal. Employees can also view that information and can input onto it.

Although the target setting is once a year with at least twice a year reviews of achievements, managers are encouraged to oversee the objectives and to review performance more frequently.

What has changed in the Council is that the PDRs are linked to the pay and grading system. Employees can get increments within their grade or receive a rating, and consequently get a pay rise as a result of how they perform in their PDRs, whereas previously they just got their standard annualised pay rise each year. So, spinal point columns were introduced.

According to a middle manager from Council 1, the new performance and development review process started to assess behaviours alongside performance outputs, which they never used to do before the transformation programme. The Council's behavioural framework is their guide for this which is based on the four key behavioural areas with an acronym BEST. The aim is to ensure that they are all consistent and aligned in a positive way of going forward in the organisation:

BEST stands for: Belief in ourselves in our organisation; Excellence, the quality of the work that we're doing; Success, delivering the outcomes and celebrating that; and Trusting ourselves and each other in the organisation.

Similar to STW, at Council 1 the regular performance conversations between managers and staff are opportunities to identify and overcome performance issues through training and development programmes, mentoring, coaching, empowering and one to one support.

The managing director of Company 12 (Electrical Manufacturer) had a distinctive view of the performance measures, suggesting that for creating agility, performance systems should be able to measure agility and speed and the effectiveness of responses at organisational, team and individual levels:

I think it's the old fashioned expression you get what you measure. So if you want agility, you need to be measuring that... An agile organisation I think needs to have some performance metrics, some measures, that relate to that agility and however they choose to measure it. So it could be number of improvement actions, the number of projects that are running, or improvement actions that have delivered something, or the number of suggestions for example. or the time to respond to a customer's problem...

The majority of participating organisations, 13 out of 17, reported that they have behaviour-based appraisals so that their performance expectations reflect desired workforce agility behaviours and shared values. For instance, at Company 8 (Aerospace), there are a range of behavioural competencies for each role that they regularly review people against in their appraisals. While behaviours and rewards are not linked directly, behaviours are considered as the criteria for promotion to the next level. Moreover, performance system at Company 8 (Aerospace) is based on contributions in outputs. So, the times spent to on a task are not monitored. In addition, line managers regularly review key performance indicators (KPIs) in each department and team. Apart from the formal weekly KPIs reviews, managers are usually available for informal chats about performance

outputs and risks.

Another common characteristic was the linkage between performance system, talent management and learning and development which identifies learning opportunities and potentials in the short-term. For instance, at Company 7 (Instruments Manufacturer) the performance management process is an opportunity to identify training and development needs. There is another programme that runs alongside the performance process which is called the nine-box model and links performance management with talent management practices. This is an effective programme for identifying high potential employees and developing them.

The importance of measuring contributions in outputs and outcomes rather than tasks and presenteeism was commonly highlighted in organisations which implemented agile working practices as part of their agility programme, including Council 1, Council 2 (Housing Dep.), Council 2 (Housing Dep.), Council 4, Council 5, Company 1 (Telecom), Company 3 (Multi- Businesses), Company 5 (Utilities). For instance, a HR leader from Company 2 (Banking) explained:

We have had to work with our businesses going through the agile model, to ensure that line managers and employees themselves really understand how performance management should work. We decided that in a flexible working environment, because you can't see that, you have to judge it on output, because really as a manager all you're seeing is you did x and the result was y.... So our kind of phrase that we use, it's not about the hours that you do, but what you put into the hours.

5.6 Learning and Development

Given the emphasis that agility authors put on leveraging the knowledge and competencies of employees through training and development, the aim of this section is to further explore this HRM domain in organisations pursuing agility. An important point of emphasis in this section is that the majority of learning and development (L&D) systems running in the participating organisations have been strategic. It is because they have emphasised building a learning culture, systematic and continuous learning, and integration with talent management strategies. Findings from the participating organisations identified a series of distinctive characteristics for learning and development practices in organisations trying to create agility. These characteristics are categorised in three groups as shown in Table 5.7:

Table 5.7: Characteristics of Learning and Development practices in organisations attempting to create agility-
summary of the findings

L&D Strategic Goals:
<ul style="list-style-type: none"> • L&D strategy and offers are aligned to the organisation’s strategic direction, the business plan, the workforce plan, the vision, values, and desired behaviours and outcomes • L&D strategy have both proactive and reactive approaches to the learning and development of employees. While L&D react to the needs stemming from competencies gaps and business, teams and individual needs, they are also business-integrated which proactively address marketplace and business imperatives and competitive strategies. • The main aim of L&D is to build a strong learning culture that supports ongoing learning in which employees have every opportunity to grow and develop to achieve their full potential from the beginning throughout the entirety of their careers • L&D strategy includes all categories of employees and provides every employee with the learning tools and solutions that support their ongoing learning, continuous skills and capability development, and continuing progress in their careers. • L&D programmes are integrated with performance management and talent management strategies in order to develop employees to their full potentials. • Employees have ultimate responsibility for their development, while managers provide an ongoing support to their teams to create their own tailored development programme. The continuous performance management process ensures that employees receive regular feedback on their progress. • Employees are encouraged to learn multiple competencies and to educate their colleagues by actively sharing information and knowledge. • Companies have an online e-learning portal. All employees have access to extensive learning resources and online/offline training programmes for their own personal, technical and professional development • Employees are encouraged to work towards membership of professional bodies governing their specialism or work area.
Content and Focus of Learning and Development:
<ul style="list-style-type: none"> • L&D solutions focus on developing agile attributes. L&D identifies capabilities and behavioural priority areas and the gaps that are necessary to be covered in order to create workforce agility • L&D programmes embed core values and the emphasis is on desired behaviours and outcomes and common performance metrics • The content of the L&D programmes are focused on competitive strategies and promoting innovation. There is a constant emphasis on increasing customer satisfaction and shareholder value. • L&D programmes include the foundations of: <ul style="list-style-type: none"> - Managing change: a combination of educating people about the changes that are going to happen and the reasons for them, and then providing them with the skill sets to be able to implement those changes. - Systematic approach to solving problems - Questioning techniques and sharing innovative ideas without fear of failure

- Entrepreneurship which helps people become more business driven and knowing the market and customer requirements
- Self-management and self-leadership capabilities
- L&D solutions provide professional development to managers including various managerial sessions around the performance management process, change and managing change, leadership and staff engagement, building resilience and flexibility, coaching, leadership development, developing and leading virtual teams

L&D Activities Design:

There is a range of various L&D opportunities on offer which include:

- Sufficient and comprehensive induction programme
- Formal external/internal training course and practical support
- Professional qualifications
- Internal coaching or mentoring
- Lunch and learns practice: informal peer-to-peer learning in which employees with expertise in a particular subject educate other colleagues
- Learning sets or networking groups, social learning
- Knowledge-sharing
- Conferences and seminars
- Job rotations and cross-training
- Broadening job responsibilities to stretch employees personally and professionally
- Project works /assignments
- Job shadowing /observing
- Self-learning: providing books, DVDs and on demand e-learning tools, and access to extensive online learning resources
- Professional memberships and access to external events
- Action learning with other people in similar positions
- Lateral secondments/ movements

Many of these elements were identified very clearly in the majority of the participating organisations. For instance, at Council 4, L&D used to be predominantly either professionally based or for leaders and managers. As part of their agility programme, they have introduced a more focused L&D offer for all levels of staff, so that they can support the capability development across all personnel rather than just focusing on the leadership level. The council's OD business partner indicated that their L&D offers are aligned to the organisation's strategic direction, the vision, values, behaviours and desired outcomes as an authority.

He reported that when the council considered being an agile organisation, the existing L&D programme at the time was still suitable. However, as the council's strategic

direction changed to significantly and rapidly become an excellent commission authority, their L&D programme has changed its focus. So, they identified skills, capabilities and mindsets that different types of roles would require. They have identified capabilities and behavioural priority areas that would help them shift the organisation most significantly. So, they started to plan some L&D solutions around those priorities.

Council 1 has gone through a huge transformation in the structure and delivery of the services. The agile working practice has changed the nature of some jobs and requires the flexibility of employees who expect more autonomy at work. Managers have played an essential role in promoting organisational agility and acceptance of change. To accomplish this, they required professional development to manage agile workforce.

They have been provided with various managerial sessions around the performance management process, the performance development review (PDRs), and the new services especially in the early days of the transformational changes. There is a lot of e-learning linked to the Chartered Management Institute learning library that has been put onto the HR portal for managers to facilitate their managerial development. They introduced an objective called a *Managers' Standard* which aims at developing managerial competency. The competency based standards help managers to understand the minimum level of required competencies, and identify any possible gaps. The HR team support them to fill those gaps.

Council 1, as part of the Council's transformation, has been moving more towards a blended learning which includes more e-based and informal peer-to-peer learning. Traditionally L&D opportunity at Council 1 was very formal and classroom based where people were going on courses or the council was supporting the further education of some employees. As a result, they have very well qualified individuals, and a lot of employees with degrees and Masters. A senior HR manager explained how they increased the opportunity for continuous learning in multiple competencies areas by introducing "lunch and learns practice" in which employees with expertise in a particular subject educate internal colleagues and the community:

HR within the HR function has introduced lunch and learns over the last 12 months, where individual members of staff who've got an ability or an expertise in a particular subject will do an hours facilitation on that subject, and that will be opened up to the community and then the community can put in for attending there, those lunch and

learns. So I've done a few on commercialism, on lean and on workforce planning, and we've had other people do stuff on engagement and learning and development, organisational development, to help educate the staff within the HR function.

Similarly, at Council 2 (Housing Dep.), change management is an area of focus in their learning programmes. The agile working programme manager indicated that they have done many learning activities about change and managing change. As a result, the last staff survey indicated that they have improved considerably in terms of managing change, leadership and staff engagement in comparison with before.

At Momouthshire County Council, there is a centre for innovation where people from any grade, level and department from all across the organisation join a three weeks learning process. While it is not a formal training, the programme teaches people about neuro-linguistic programming, cultured techniques, questioning techniques and it also teaches them how to have and share ideas and innovation without fear of failure. Moreover, the council's agility programme requires people to be self-starters, and leaders to change their leadership approach. In order to develop self-management and self-leadership capabilities, they have introduced a coaching development management. So, they teach people coaching techniques that they can use on their colleagues' performance management. They also developed an entrepreneurship programme which helps people become more business driven knowing the market and customer requirements.

At Council 2 (Housing Dep.), learning strategy was developed on the back of the organisation's business plan and the workforce plan. Thus, the logic is that no development took place unless the business plan was driving it. Consequently, L&D needs stem from business needs, teams and individual needs-coming from performance reviews. While they have some proactive approach to learning, training mainly reacts to the existing needs identified by competencies blockage, especially where they have direct consequences of people not performing well.

In addition, L&D activities at Council 2 (Housing Dep.) include many types of training such as formal, informal, social, and mobile and action learning. Employees are encouraged to learn multiple competencies and to educate their colleagues by actively sharing their information and knowledge. The learning and development manager at Council 2 (Housing dep.) explained:

We skilled a lot of our trade employees, we use our own carpenters to train plumbers in carpentry; we use our plumbers to train our carpenters in plumbing. And we have facilities to support that. we also train our call centre staff who have to take 1000 of call about repairs to the properties, we look after 29000 houses or homes, so you can imagine the amount of calls and diversity of calls coming in.

Investigation about L&D outside the local government organisations identified a more serious commitment to development of employees. The other companies which participated in the research devote continuing investment to systematic training and the development of their employees. For instance, Company 3 (Multi- businesses) has continuing investment in training and real passion for developing people's skills, confidence and experience. The organisation is awarded a national accreditation, 'Investors in People' (IIP) which proves they have the very best training and development practices and policies in place for their employees. These include internal courses, professional qualifications, personal development plans and lifelong learning initiatives.

The group's head of business transformation indicated that when they aimed to create more agility in the organisation, the existing foundation of L&D practices was good enough. However, on top of that, they created a series of master classes that were designed to help senior teams move into a different way of management, and to reinforce their confidence around managing in a different way, where people might be working more agilely:

it's really we haven't changed management practices per se, but what we've created is a dialogue through these master classes that have allowed people to really shift their perceptions from the way they used to work to the way they need to work... we've done those in a kind of contained environment, so that people feel comfortable in asking a really stupid question, or questions that they feel are really stupid, without feeling that they're being exposed in front of their team.

In addition, there are ranges of learning programmes, such as leadership development intervention, available online. For example, two of their businesses have got specific online learning interventions that help enhance product knowledge and customer service. There are also a range of technical interventions and technology that support the HR in learning and development.

Similarly, Company 1 (Telecom) devoted considerable resources to the growth and development of its employees. They developed a company-wide commitment to learning which has resulted in an 'Investor in People' accreditation. The company has a clear L&D

Strategy for creating an infrastructure that encourages and supports ongoing learning. The main aim is to build a strong learning culture in which employees have every opportunity to grow and develop to achieve their full potential from the beginning throughout the entirety of their careers. Managers provide ongoing support to their teams so that every employee has their own development action plan which is specially tailored to help them succeed in their job and progress in their career. The continuous performance management process ensures that employees receive regular feedback on their progress.

Company 1 (Telecom) also encourages all employees to work towards membership of professional bodies governing their specialism or work area. They run a number of accredited company schemes including The Institute of Electrical Engineers, The British Computer Society. Company 1 (Telecom) is also a Quality Partner of the Chartered Institute of Management Accountants. Furthermore, the company has an online e-learning portal and all employees have access to extensive learning resources and online/offline training programmes for their own personal, technical and professional development.

In addition, there is a range of different learning and development opportunities on offer which include external/internal formal training courses and practical support; internal coaching or mentoring; collaboration; social learning; peer networking; knowledge-sharing and 'buddy' programmes; conferences and seminars; shadowing /observing; special projects/assignments; additional job responsibilities to stretch employees personally and professionally; and job rotations. In terms of agility in particular, a senior strategy manager from the company explained that everybody in the management team receives special training preparing them for managing an agile team:

...whenever someone is promoted into management first, they will be sent off on a leadership skills training course, and we have huge amounts of online material available to people as well about how to plan a team, how to manage and motivate agile teams, how to pick a team to make sure you have the right skills across it, how do you make sure everyone across a team gets a say.

At Company 2 (Banking), employees have the ultimate responsibility for their development. Throughout the entirety of their career, they create their own personal development plan so that they can develop in their current roles and progress in their future career. Managers have regular discussions with their teams about their progress and any professional and personal development so that they can make sure that all employees know

about their performance and developmental expectations and how these contribute to the Group's success.

The overall L&D strategy at Company 2 (Banking) is to provide every employee with the learning tools and solutions that support their ongoing learning, continuous skills and capability development, and continuing progress in their careers. One of the group's HR leaders indicated that as they are a very multi-faceted organisation, every division has their own learning team. So, every business will cater for training people in changes in the market differently depending on the nature of that business. She also reported from her experience of working with technology services that the focus and design of training in agile organisations with globally distributed virtual teams is different from traditional organisations. For instance, their technology teams are global, so they have designed action learning sets to develop virtual teams and support managers in leading virtual and effective teams.

My team have created specific e-learning modules, so they are online sessions that everybody has access to, and we developed all these modules called working at a distance, managing at a distance, and we covered all these things around the challenges for line managers of managing people who work far away from them. And also for employees around the areas of trust, communication, quality management, that type of thing. So we do sometimes have group link products like that, and quite often there will be divisional based peer led trainings that we've set around the business needs.

Similarly, Company 8 (Aerospace) is reported that to have made heavy investment in the training and development of employees. The company has a clear strategy for building a strong learning culture and for continuous training and development. Their educational framework supports creating agility by ensuring that the company can anticipate and respond to increasing changes in market, technology and customer requirements.

Therefore, the contents of the L&D programmes are focused on competitive strategies and promoting innovation. There is a constant emphasis on increasing customer satisfaction and shareholder value. At Company 8 (Aerospace), all individuals have the ultimate responsibility for their own training. Managers support their teams to create their own tailored development programme.

At STW, however, skills and competencies development is the mutual responsibility of employees and managers. Managers are responsible for identifying the appropriate

development plans for each team member by assessing their performance and considering their aspirations and their level of potential for stretching in their current role or for future promotions.

The HR manager at Company 9 (Automotive) highlighted the importance of their very interactive induction programme and on the job experience, on the job mentoring and coaching by supervisors and rotation. What they do is to hire people with the basic knowledge and attributes, and over a period of time train them to a very high standard of knowledge.

Similarly, a senior director at Company 6 (Law) also highlighted the importance of a comprehensive induction programme in creating workforce agility and responsiveness. He reported that the lack of sufficient detailed induction and training for new recruits is an inhibitor to agility in their organisation. He added that it takes usually 3 to 6 months for a new recruit to become relatively competent, but they can do that much faster if they have formal induction training.

The managing director from Company 12 (Electrical Manufacturer) indicated that in order to create agility, specific sets of learning and development are needed. He argued that creating a culture change to agility needs a medication of the learned responses, and a redefining and a resetting of the values and beliefs within the organisation. So, the L&D should include a combination of educating people about the changes that are going to happen and the reasons for them, and then providing them with the skill sets to be able to do those changes. Those skill sets can be specifically technical, but they can also be around managerial and interpersonal skills. He believes learning and development is a part of HR. Thus, that it is HR's contribution to enabling the change by providing necessary learning resources and solutions whether internally or externally.

He added that in increasing unpredictable and changing business conditions, L&D must include the foundations of managing change. At the manager level, they need to understand the psychology of change. There needs to be some development in how they implement the change, and how to move, engage and motivate people through a series of stages - denial, acceptance, anger, and debate via engagement. There also needs to be some development in effective two-way communication, and how to build teams of people, as well as how to engage with people who are resistant to change.

Furthermore, in an increasing agility environment, the ability to respond quickly to customer requirements is extremely important. So there needs to be some mechanisms in place to teach people the boundaries and limitations and a systematic approach to solving problems.

5.7 Employee Engagement

The five domains of AOHR practices introduced in the previous sections, mainly enable the business in identifying current and future competency needs, attracting and recruiting the suitable individuals with the required skills and agile mindset, and developing them through effective L&D strategies and programme. However, as suggested by Wright et al. (2001) only motivated and committed employees are able to utilise their skills toward better performance.

Supporting this argument, the findings show the intensity of emphasis on the importance of employee engagement practices in promoting workforce agility, underlining the criticality of motivating and empowering employees. Thus, it has been derived that employee engagement practices, built on top of the foundation of above-mentioned five domains of HR practices, significantly contribute to the creation of agile attributes.

While the practices in the areas of empowerment, communication, rewards and recognition were widely cited by participating organisations as being essential in increasing employee engagement, they will be discussed in separate sections. This section particularly presents the findings about employee engagement practices.

The employee engagement mechanisms that are being used by participating organisations are summarised and shown in Table 5.8:

Table 5.8: Characteristics of employee engagement practices in organisations attempting to create agility-
summary of the findings

Employee Engagement
<p>Employee engagement mechanisms that are being used:</p> <ul style="list-style-type: none"> • Employee forums: where they consult with employees and update colleagues on a regular basis. • Consultation and engagement activities such as employee opinion surveys, people insights team, employer listening team, quality of working life committees, • Suggestion scheme where people can post ideas. • Ideas sessions: where they encourage people to have ideas and to have innovation and enterprise. They facilitate those ideas to come into fruition • Motivation: Employees’ motivation comes from personal satisfaction, self-actualisation and empowerment. They believe people are more motivated when they feel more responsible, more valued, and trusted. They motivate people by helping them to understand their critical role in delivering business objectives and KPIs, by developing them and understanding and helping them to move towards their career aspirations. • Leaders and managers: at the time of changes they make sure that they are thinking about and taking account of employees’ ideas

When asked about what mechanisms are being used to boost employee engagement, the OD business partner at Council 4 reported that they have employee forums, where they consult with employees and update colleagues on a regular basis. As part of their organisational development activities (OD), they support and prepare leaders and managers for changes to make sure that they are thinking about and taking account of employees’ ideas through several consultation and engagement activities.

At Council 5, as explained by their HR manager, several practices of employee engagement are applied to achieve employee involvement which is regarded as necessary to create agility:

For example, we have ideas sessions as part of our school of innovation. So individuals might list a hundred ideas and then we’ll work through those ideas, some of them will be completely useless but it’s about developing them in that way. So we facilitate those ideas to come into fruition, and then facilitate them with programme management skills. Then, they will be invited to ask the authorities who’ve got an interest in a particular subject area to work on it with them. So we’ve got these frameworks in place so that we can encourage people to have ideas and to have innovation and enterprise.

Similarly, an HR leader from Company 2 (Banking) provided some examples of practices

that they use to promote employee involvement such as employee opinion surveys, people insights team and employer listening team and the quality of working Life committees.

At STW, they use different combinations of employee involvement practices to motivate employees and earn their commitment and engagement. These include employee development programmes, continuous performance management and moving employees towards their career aspirations. A senior manager from the company argued that for very few people motivation comes from money. Supporting the Maslow's hierarchy of needs theory (1943), he stressed real motivation comes from personal satisfaction, self-actualisation and those things at the top end of Maslow's Model:

I think for us, how we motivate people is more around understanding that we're all part of a team, we're all part of the KPIs, so they're important to us as a business to deliver what we need to deliver. Understanding how important their part is in that and what they can achieve individually but how that helps the business achieve it as well. So it's more focusing on that than the money aspect of it. As I say, it's a hygiene factor. So for us, it's more about to develop people, and making sure we understand what their career aspirations are, how we can help them develop and get that and move towards those career aspirations in their current roles, how we can help them get to where they want to go to next, it might be in the business, it might be outside the business.

The HR manager at Company 9 (Automotive) reinforced the view of the senior manager at STW on the role of monetary incentives in earning employees' engagement. He explained how they changed their philosophy of prising people for their suggestions to the mindset that everybody equally has an important role in achieving business objectives.

5.8 Empowerment

The agility subject researchers tend to consider control and hierarchy as an inhibitor for workforce and organisational agility. In contrast, freedom in decision making and empowerment has been widely seen as an enabler for agility. The interviewees were asked to share their views and experience about these issues which are summarised and shown in Table 5.9:

Table 5.9: Characteristics of empowerment practices in organisations attempting to create agility- summary of the findings

Empowerment
<ul style="list-style-type: none"> • Empowerment, which delegates more decision-making to individuals and teams, is critical for employee involvement and crucial in achieving agility. • Agility is not about micro managing. Without empowerment and delegation of authority, decision making process will be very slow. • They distribute authority and power based on expertise rather than hierarchical position. • There is a certain amount of autonomy given to people who are in a management position, about how they manage their team, how they manage their relationships with their suppliers or with their internal customers. They also share decision making power and authority with people who are closer to customers • They create a climate of trust and interdependence and reinforce organisational citizenship and personal accountability. • They promote empowerment by introducing training sessions and coaching development programmes to develop self-management and self-leadership capabilities. They teach people to be self-starters, and support leaders to change their leadership approach • Performance management frameworks support empowerment principles by providing people with the freedom for experimentation within the boundary of meeting their performance expectations. • At local government organisations, empowering local decision-making is not such a straightforward agenda as implied for private sector and manufacturing organisations. As they are political organisations, they have to be more bureaucratic and hierarchical, so they need to have formal schemes of delegation • Some participants argued that there has to be a balance between control and autonomy. Therefore, a certain level of procedures is necessary to keep control over the products/services and operations.

A participant from Company 8 (Aerospace) reported that they delegate more decision-making to manufacturing and production teams. They believe that valuing and empowering employees is critical to the success and sustainability of their business. So, they work so hard to create a climate of trust and interdependence and reinforce organisational citizenship, personal accountability. They distribute authority and power based on expertise rather than hierarchical position. However, he reported that authority to make decisions depends on what level or what the implication of that decision is.

Similarly, the HR manager at Council 5 highlighted the importance of empowerment in achieving agility by suggesting:

I think on an individual aspect, it's very important that people are allowed the freedom and the trust to be able to behave and think differently. If you don't give them the trust to do their jobs responsibly and behave in the way that they think they need to behave, you can't get total agility because they're only ever focused on the place that they go to rather than focusing on the job that they do.

In line with the Council agility programme and establishment of the innovation centre, they have introduced some training sessions and a coaching development programme to develop self-management and self-leadership capabilities. Moreover, their new performance management framework provides them an opportunity to give people the freedom to do things in the way that they know best or the way that they work best. However, the HR manager highlighted that with that freedom comes a responsibility to deliver. They give people outcome based work with a deadline, a timescale, and their key milestones. Employees need to decide how they want to work to achieve those outcomes. They are expected to report back at regular intervals. There are regular conversations of whether they need additional help, training or resources.

A senior strategy manager at Company 1 (Telecom) suggested that agility is not about micro managing. Without empowerment and the delegation of authority, the decision making process will be very slow. Similarly, an agility consultant related the issue of hierarchy to the speed of decision making and agility by suggesting a flatter organisational structure leads to quicker and more agile responses. He argued this needs a sharing of decision making power and authority with people who are closer to customers:

Agile organisations are going flatter, and decision making gets nearer the frontline, within given constraints obviously, there has to be levels of authority otherwise you get into what some of the banking sector manage to achieve, which is responsibility without authority or authority without responsibility... you can't always have a committee to make decisions... But so long as you've got a sensible way of making decisions and you've got a flat structure that insures knowledge transfers very quickly between and across the organisation. So I think agility in that sense, in empowering the right people and the right people are often the ones that are in closest touch.

When the idea of empowering local decision-making and its impact on agility was discussed with an OD Business partner at Council 4, he suggested that it is not such a straightforward agenda as it may be for manufacturing organisations. The council has a more complex environment, so the implications of decisions and actions have to be understood in a far more integrated way.

For a senior director from Company 6 (Law), employee empowerment is critical to achieving agility. However, for him minimising rules and procedures brings risks and creates chaos. Performing in a legal environment, he suggested that there has to be a level of control in the sense that employees can make improvements and there has to be a balance between control and autonomy.

5.9 Communication

Findings from the participating organisations suggest that communication activities should reflect the following characteristics in organisations trying to create agility:

Table 5.10: Characteristics of communication practices in organisations attempting to create agility- summary of the findings

Communication includes:
<ul style="list-style-type: none"> • Communicating marketplace and business status regularly (both positive and negative issues) informs employees about the urgency to change which is crucial in achieving employees' engagement • Communicating shared values, business plans and objectives, common performance metrics, the brand image, global and the regional strategies, organisation's overall and local performance results, competitors' status, all information from customers and business partners, and all information about the changes that may affect employees • Managers communicate with their teams where things do not work effectively, so employees can see it as a learning exercise rather than negative experience.
Communication Principles:
<ul style="list-style-type: none"> • Create a climate of open and two-way communication with clear communication methods and reporting structure. • Channels of bottom-up communications are available for employees to ask questions or clarify and understand different issues. Channels of top-down, side-to-side and inside-out communication are also available: Such as regular road shows where board members do presentations to staff regularly • Employees are encouraged to share their knowledge, information and suggestions on different matters: the knowledge-sharing processes are designed in a way that ensuring information and knowledge are shared across the business quickly and effectively. • Employees are encouraged to have social interactions and there are formal and informal mechanisms such as 'community of practices' and 'social networks' which facilitate those interactions.
Communication Mechanisms
<p>They employ a wide range of communication mechanisms which include:</p> <ul style="list-style-type: none"> • Person to person verbal and face to face conversations, regular monthly/weekly/daily group meetings, emails, intranet, electronic forums, company video, newsletters, notice boards and electronic bulletin boards • Corporate social networking website such as 'Connections' where senior leaders and

managers communicate with their employees through blogs, updates, forums, online conferences
Importance
<ul style="list-style-type: none"> • Communication plays a very important role in promoting employee engagement and achieving workforce agility • Having a clear organisational structure and communication framework is essential for creating workforce agility. • Some organisational structures facilitate communication more than others
Virtually borderless workplace and open architecture eliminates organisational borders and connects employees and allows more communication and collaboration

The MD of Company 12 (Electrical Manufacturer) suggested that as creating agility starts with changing mindsets and behaviour, so communication plays a very important role in agility development:

To have that agility you have to be able to communicate in a number of different areas. Some organisational structures will facilitate communication more than others, the communication needs to be complete and it needs to be fairly quick.

The talent manager at Company 10 (Food) indicated that having a clear organisational structure and communication framework is essential for creating organisational and workforce agility. She also highlighted the importance of communicating business and marketplace status and the need for implementing changes in achieving employees' engagement:

There has to be the right structure in place in order for the communication and management of the workforce. So if you've got lots of change going on, being able to communicate efficiently and effectively what's going on I think is the first step. Because if you're asking employers to be agile and adaptive, they need to know what they're being agile and adaptive in response to if that makes sense. So I think making sure there's a clear organisational structure, and communication framework. So that people understand the context of the business that they're working in, and they understand the reason why to start with, because I think that's a big factor in engaging people. So if they understand why do things keep changing, that can really make a big difference to how they respond to a situation, positively or negatively. Whereas if they feel they're not being communicated to and they don't understand the reason why, that can I think create quite a bit of resentment sometimes.

She also highlighted the importance of creating a climate of open and two-way communication and indicated that at Company 10 (Food) they have clear communication methods and reporting structures. It is clear for managers who they are communicating what to and when as well. There are channels of bottom-up communications also available for employees to ask questions or to clarify and understand different issues. Employees are

encouraged to share their knowledge and suggestions on different matters. The Company's communication plan also includes communicating the group's values, and business model continuously through different mechanisms such as company video, newsletters, notice boards and group communication processes.

The HR director of Company 9 (Automotive) indicated that they have increased employee engagement by communicating business and marketplace status, global strategies and performance, the regional strategies and performance, and the local performance. He also highlighted the importance and effectiveness of their regular daily management meetings, and indicated that they communicate both positive and negative business issues with employees through what they call stand down or toolbox talks.

Similarly, at Company 7 (Instruments Manufacturer), they regularly communicate with employees about business status, both positive and negative matters. The human resources director indicated that this approach informs employees about the urgency to change. A senior director at Company 7 supported this view by indicating that:

I think unless you share the business's problems and the business's challenges with people, then people can't adapt and rise to those challenges.

The communication at Company 7 (Instruments Manufacturer) includes communicating the company's vision, values and culture. While the importance of verbal and face to face communication was highlighted by their HR director, she indicated that how they use the software system as a tool to employ a wide range of communication mechanisms ensures a seamless flow of information. They have introduced an internal intranet that is going to replace IBM Connections. This is a corporate wide Facebook type of environment where their 5000 people can have communities and blogs and share files in a fairly informal way.

Similarly, Company 2 (Banking) uses a corporate social networking site called Connections for communicating to its employees. The Connections network encourages people to share their ideas and concerns more openly. The company also uses social media to communicate across organisational boundaries. For instance, they use social media as a way to attract new talents. They have a jobs Facebook page which they claimed to be the second largest LinkedIn recruitment site in the UK.

And finally, one of the key elements that a majority of participants argued promotes effective communication and coloration is the borderless workplace with an open architecture. An ‘Agile Workplace’, as it called by participants, eliminates organisational borders and gives employees a greater chance to communicate, share information and knowledge and collaborate. According to a HR leader at Company 2 (Banking):

It (agile workplace) gives people more flexibility, having the right office environment, having the right technology to support people’s mobility, all of these things will create enhanced productivity, collaboration, engagement.

5.10 Reward and Recognition

Findings from the participating organisations suggest that rewards and recognition practices should reflect the following characteristics in organisations trying to create agility:

Table 5.11: Characteristics of rewards and recognition practices in organisations attempting to create agility- summary of the findings

Rewards and Recognition
<ul style="list-style-type: none"> • Continuous rewards and recognition • Rewards and recognition practices embed agility-oriented behaviours: Reward and motivate employees for demonstrating agile people attributes • Rewards and recognition is linked with performance and behaviours, management, learning and development and talent management practices • Rewarding mechanism which is mismatched with AO behaviours is counterproductive to agility • Range of applied rewards and recognition practice: <ul style="list-style-type: none"> - Traditional monetary rewards and benefits: competitive salaries, personal holiday entitlement, an award-winning pension scheme, tax-and NIC-advantageous salary sacrifice schemes, pensions and childcare vouchers - Discounts on company’s products - Provide negotiated discounted prices or cash back at featured retailers - Retirement Plan - a defined contribution scheme providing pension and life benefits - Sharing ownership: Share save and Profit sharing - Non-monetary incentives or recognition: gifts, celebrations, dinners. - On-the-spot recognition - Team-based rewards system - Focus on social responsibility: show concern for the employees’ families, invest in the communities where they live - Flexible working hours and the option to work remotely, where appropriate - Benefits reflect the full value of employees’ skills, experience and qualifications. They continuously encourage employees to develop and grow and their benefits and bonuses improve as they grow - Social rewards and recognition tools: online reward and recognition system where peers can feedback on their colleagues’ contributions and recognise the areas of improvement in their

- performances. Customers can also recognise employees' adaptive behaviours or their outstanding jobs
- Establish Thank You system as part of corporate culture
 - L&D opportunities: exposure of projects getting recognition for contributions.
 - Career progression opportunities: promote employee mobility

For instance, when asked about what sort of rewards and recognition practices are supportive for creating workforce agility, The MD of Company 12 (Electrical Manufacturer) highlighted the importance of having a formal rewards and recognition mechanism that embeds agility-oriented behaviours. A supportive reward system for agility awards employees for their flexible, collaborative and adaptive behaviours and motivates them to share information, learn new skills and work in fluid assignments. So, it links rewards with people performance and behaviours. He also added that a reward mechanism which is mismatched with agility-oriented behaviours is counterproductive to agility. He also advocated a team-based rewards system which rewards the teams for team activities rather than individuals' achievements:

Teams can achieve more than individuals, unless there's something particularly specialised, But generally where there's a response to a customer requirement, a team response is more powerful, because you have a number of people who share responsibility and engage with it, and therefore they're all focused on the same output. If the reward mechanism is team based, it helps reinforce that.

He outlined that while rewards and recognition can be monetary, it can also be little things such as on-the-spot recognition:

The recognition can be little things, comment on something 'well done, that was really good', making a fuss about something that's gone well, recognising a behaviour or an event that exhibits characteristics that you're trying to develop and making a play of it and saying 'this was important, this was very well done, this was a good example, now it would be nice for other people to get on board'.

At Company 3 (Multi- Businesses) the organisation's approach to rewards and recognition is that the Group is trying to meet the common needs and aspirations of its employees, sharing ownership with them and making decisions democratically. There is a clear focus on social responsibility and creating value for their members by providing them with the best possible services and to invest in the communities where they live. For example, they have an Employee Assistance Programme, which provides expert help and advice on a wide range of issues. The Group's philosophy is that the business and its unique identity are the real benefits for their employees.

In addition, they offer a range of traditional monetary rewards and benefits including competitive salaries, personal holiday entitlement, an award-winning pension scheme, tax- and NIC-advantageous salary sacrifice schemes, and pensions and childcare vouchers. There are also profit sharing and employee stock ownership plans available to employees who are also members of the Group.

Similarly, Company 1(Telecom) offers all its employees a range of benefits that reflect the full value of their skills, experience and qualifications. They continuously encourage employees to develop and grow and their benefits and bonuses will also improve as they grow. The company showed honest concern for employee well-being. They actively encourage flexible working which increases a healthy work-life balance.

A senior strategy manager at Company 1(Telecom) reported that their reward and recognition system is closely linked to their performance management system. As a result, the bonus system and incentive arrangements are slightly different in different parts of the business. In addition to the monetary compensation, they have an online reward and recognition system which is used as a social rewards and recognition tool. It is an environment where peers can feedback on their colleagues' contributions and recognise the areas of improvement in their performances. Customers can also recognise employees' adaptive behaviours or their outstanding jobs. So, the 'thank you' system is a part of Company 1(Telecom) corporate culture that creates an atmosphere of positivity within the organisation. It also motivates people to try a new way of working to get customers to recognise them.

At Company 7 (Instruments Manufacturer), rewards are based on individual and team performance. Monetary incentives and pay is a big part of their rewards structure. As reported by their HR director, they benchmark their pay strategy and benefits against the technology and pharmaceutical industries to make sure that they attract and reward people at the right level of pay and that they are not overpaying or underpaying. As a technology company which demands a high level of engagement from its high-skilled engineers and scientists, they use a number of compensation packages to attract and retain knowledge workers. These include employee share ownership plans and bonus schemes.

As part of a rewards and retention strategy, they provide employees with opportunities to develop themselves professionally. Good performing employees get considerable

exposure on projects in the company, and then they get a lot of recognition for their contributions. They also promote employee mobility throughout the organisation which helps the company to retain its employees and support employees to move into their chosen profession within the organisation.

The HR manager of Company 9 (Automotive) highlighted the importance of having continuous rewards and recognition in creating and sustaining workforce agility. Through their continuous recognition system, he believes, they have conditioned their workforce. So, they become able to create and sustain creativity. He stressed the role of HR in encouraging and supporting line managers in recognising the achievements of employees. They have a range of monetary and non-monetary incentives and recognition practices which do not necessarily cost the business so much. The attempts to make employees feel more recognised and committed are not limited to the workplace. The company shows concern for the employees' families and the communities where they live. The environment of openness and caring encourages employees to commit to their job and feel more engaged.

A HR leader from Company 2 (Banking) reported that the company has a very strong reward management system that sits behind their performance outcomes. They reward people for their behaviours not just for their achievements. Similarly, at Company 5 (Utilities) as reported by a senior manager, the reward system is linked to their performance management system, so that people are rewarded for both their behaviours and performance achievements. The Company 5 (Utilities) behaviour model is an integral part of their performance management and reward structure.

5.11 Summary of the Chapter

This chapter reported the findings associated with the last research question, i.e. **What HR practices are being used by organisations and are perceived as effective in achieving organisational and workforce agility?** The HR practices employed by the participating companies were identified and classified into nine major areas of HR. The results also indicate that employee engagement activities in addition to empowerment, communication, and rewards and recognition practices have the greatest impact on the manifestation of agile attributes.

Findings presented in chapters four and five support the notion that HRM, in order to contribute to agility development, should craft a HR strategy that plans for developing agile attributes by applying a consistent and aligned set of HR practices which are collectively aimed at attracting, developing and retaining agile people.

The next chapter is concerned with the interpretation of the research findings in comparison with the previous research within the field.

CHAPTER SIX

DISCUSSION

6.1 Introduction

This chapter synthesizes the findings and provides an interpretation of them in light of the research questions, the previous literature, and the preliminary conceptual framework as outlined in Chapter Two. The main aim of the chapter is to demonstrate how the findings of the research answer the research questions and how these answers fit in with the existing knowledge on the HRM-Agility topic. To achieve this, the existing literatures are re-examined to identify the main agreements and/or differences between the literature and findings.

6.2 Summary of the Significant Findings and Their Relation to the Research Questions

This study examined the role of human elements in achieving organisational agility. In particular, it explored the way that HRM can contribute in the development of agility. The key factors to be considered in developing an agile HR strategy (such as HR and workforce agility capabilities) were studied, as were the elements involved in the successful implementation of the strategy (such as agility oriented HR practices, components of an agile HR function and the role of HR professionals).

In the two previous chapters (Chapters 4 and 5), the data was analysed within the context of the five key research questions, as shown in Table 6.1. The analysis includes the identification of key points and themes emerging from the data. In this section, the key findings from the research are presented, drawing on both outcomes from the interviews and also the researcher observations, and making comparisons to the extant literature. To assist the reader and for consistency, the section is structured along the five research questions, a theme running through the data chapters.

Table 6.1: The five research questions directing the study

The five research questions directing the study
RQ1: What is the role of organisational culture in achieving agility? What are the key characteristics of organisational culture that are both critical and supportive in creating organisational agility?
RQ2: What are the characteristics and attributes of people which are central to achieving agility?
RQ3: What are the roles of HRM in achieving organisational agility?
RQ4: What are the characteristics of an agile HR function?
RQ 5: What HR practices are being used by organisations and perceived as effective in achieving organisational and workforce agility?

6.2.1- RQ1. The Significant Role of Organisational Culture

With respect to the first research question, the findings from interviews highlighted the fundamental role of organisational culture and shared values for organisational agility. Almost all participants believe that organisational mindset is the most important factor in creating agility. This is consistent with the findings of Breu et al. (2002), Cabrera and Cabrera (2005), Glenn (2009), Accenture (2013), and CIPD (2014) who found organisational culture as a very important element in developing agile people attributes. This finding, particularly resonates with the view of Denning (2015), who similarly identified the agile mindset as a prerequisite for success in the transition to a culture of agility.

Several respondents reported that they have been working on their organisational culture by reinforcing a new common set of values which enable more agility and responsiveness. This is also consistent with the findings of Dyer and Shafer (2003) who assert that a clearly articulated set of shared values should be embedded deep into the organisation as an element of the agility-oriented organisational infrastructure.

Thus, it can be argued that agility is very much embedded in people's mindsets and shared values, rather than a selection of tools and techniques or technology. Therefore, reinforcing an organisational culture that values, recognises, rewards and enhances the behaviours required for organisational agility is the most substantial step in creating agility. The critical characteristics and principles of such an organisational culture were identified and compared to the literature in Table 6.2.

The similar sets of identified characteristics and principles from literature and findings are grouped together and presented in the same rows. These characteristics and principles of an agile culture should be aligned as a reciprocally reinforcing set of values, mindset, behaviours, and most importantly as part of management approaches and practices. Thus, as asserted by Denning (2015), embracing an agility culture impacts upon every aspect of the organisation, from workforce planning and work design, to organisational structure, management and leadership approach to the way employees work and behave.

Table 6.2: Characteristics and Principles of Organisational Culture that Supports Agility-Comparing the findings with the literature

Emerging themes from Findings	Literature
Empowerment Delegating more decision-making to individuals and teams	Autonomy in Decision Making and Empowerment, Diffused Power (Goldman and Nagel, 1993; Kidd, 1994; Van Oyen et al., 2001; Breu et al., 2002; Gunasekaran, 1998; Strader et al., ;1998; CIPD, 2013)
Personal accountability for excellent performance	Accountability (Lengnick-Hall et al., 2011; Denning, 2015; Dyer and Shafer, 2003)
Open communication environment for sharing ideas and concerns Leading by example with openness and honesty Trust Risk-taking Personal responsibility for supporting colleagues	Autonomy, trust, openness, honesty, prudent risk-taking, mutual respect, and personal accountability (Dyer and Shafer, 2003; CIPD, 2013)
Creativity Being innovative Desire to continuously improve	Nurturing Innovation and Creativity (CIPD, 2013; Goldman et al., 1995; Dyer and Shafer, 1998; Plonka, 1997)
Customer focus	Customer focus (Dyer and Shafer, 1998)
Flexibility and adaptability	Flexibility and adaptability (Dyer and Shafer, 2003; Shill et al., 2012).
Collaboration, consultation and discussion with colleagues, suppliers and customers Teamwork	Collaboration (Breu et al., 2002; Dyer and Shafer, 1998; Sherehiy et al., 2007; Shill et al. 2012; Accenture, 2013).
Fast response	Mobilizing rapid response, fast decision making and quick and effective implementation. (Dyer and Shafer, 2003; Doz and Kosonen, 2008)
Being change ready and responsive	Being change ready (Sherehiy et al., 2007; Plonka, 1997; Shill et al. 2012).
Thinking long term	Being visionary, future-oriented, big picture-oriented, (Dyer and Shafer, 1998: 17-18)
Recognising the contribution of people	Consistent with the view of (Breu et al., 2002; Goldman et al., 1995; Sumukadas and Sawhney, 2004; Dyer and Shafer, 1998)
Cooperation and participative management approach as opposed to top-down decision making and command and control approach	“Traditional inward-looking control-minded management practices are ineffective in a time of rapid, unpredictable change” Denning (2015:12)

6.2.2- RQ2. Key Attributes of Agile People

Dyer and Shafer's studies (e.g. Dyer and Shafer, 1998, 2003; Shafer et al., 2001; Dyer and Ericksen, 2006) consider 'agile people attributes' as key defining factors in crafting an agile HR strategy. Consequently, central to their agility-oriented HRS models is the identification of the employee mindset and behaviours required for creating organisational agility. Internalisation of agility-oriented mindset and behaviours by employees is similarly identified as important by interviewees at all participating organisations. It is suggested that agility-oriented mindset and behaviours are crucial to the achievement of organisational agility, appearing to support the views of previous authors and in particular, the importance placed on agility-oriented mindset and behaviours by Dyer and Shafer (2003).

While the interviewees were unanimous in their agreement that agile people attributes and in particular, agility-oriented mindset and behaviours are critical aspects of the organisational agility in their firms, it is noticeable that none of the participating organisations systematically defined the attributes of agile people as part of their agility programme, in the sequence that Dyer and Shafer's theoretical models suggest. However, the behavioural/competency models of these organisations reflect the series of behavioural characteristics that were defined by the interviewees as attributes of agile employees.

The identified attributes from the findings, however, are greatly consistent with the agile people attributes identified by previous research. Table 6.3 has been developed to show the overall consistency between the findings from the organisations and previous literature.

A contrasting aspect of the findings with the literature relates to creativity attribute. Shafer (1997), Plonka, (1997), Sherehiy (2008) and Dyer and Shafer (2003) consider creativity as an important aspect of agile behaviours. While other attributes were clearly defined and articulated by interviewees, they did not explicitly highlight the significance of creativity when they were asked to define agile people attributes. However, creativity was identified by patterns in the content of the firms' newly deployed HR practices and interventions with the considerable focus on improving innovation and creativity (in many of the participating organisations such as Council 1, Council 4, Council 5), which in turn indicates the importance of creativity for the organisations.

Table 6.3: People Attributes Critical for Organisational Agility - Comparison between findings and the extant literature. Note: the consistent views about the attributes are put in the same row

Findings	Attributes	Authors/ Definitions
Having Change-Ready Mindset: optimistic and open to change, being receptive to new ideas, Being prepared to change and recover from change rapidly, constantly looking for opportunities to change, willingness to change, adapt and modify what they are doing	Change-ready	Immediate reaction to changes and recovering from changes (Zhang and Sharifi, 2000)
		Positive attitude to the changes, new ideas, and technology (Sherehiy et al., 2007), Being comfortable with change, new ideas, and new technologies (Plonka, 1997)
Being Business Driven: having commercial awareness, understand the business, being able to understand what's going on, what the change is, and to be able to respond	Business-driven	Being visionary, future-oriented, customer-focused , big picture-oriented, results-oriented, knowledgeable about the marketplace and the way the business operates (Dyer and Shafer, 1998: 17&18)
		Oriented to bottom line organisational performance: (e.g. Understanding the business, being solution-oriented, being (im)patient) (Shafer, 1997:6)
Being Customer Focused: Enhancing customer service by having genuine desire to understand customers, their needs, concerns and behaviours and to anticipate, meet and, wherever possible, exceed their expectations.	Customer-Focused	Oriented to the context in which the organisation operates (e.g. Being customer-focused, seeing the big picture, having a vision) (Shafer, 1997:6)
Being Strategic: Driving for performance and results, empathises with the company's strategic objectives. Understands the day-to-day implications of them and works constructively with that understanding to move the organisation forward..	Being strategic	Comprehend and embrace the importance and essence of marketplace agility, the challenges of dynamic environments and organisations' strategies and approaches to thrive in such marketplaces, and articulate the essentiality of organisational agility capabilities (Dyer and Shafer, 2003).
		Have strategic vision to scan the business world (Sharifi and Zhang, 1999)
Being committed to core values: Adhere to the company's values and being protective of the reputation of the	Values-driven	Instinctively living the organisation's core values. (Dyer and Shafer, 1998: 17&18)

organisation.		
Being accountable: being a risk taker and taking responsibility for the risks/actions taken and potential outcomes	Accountability	Take responsibility for the actions taken and possible results (Dyer and Shafer, 1998: 17&18)
		Willing to accept joint responsibility for the company's success, Accountability for meeting goals they have set (Goldman et al., 1995)
		Accepting new responsibilities (Plonka, 1997)
Being empowered and trusted: being highly trusted and allowed the freedom to behave and think differently, initiate change and take risks.	Empowered	Expected to think about what they are doing, are authorized to display initiative and supported by management to be innovative
		Empowered (Gunasekaran,1999; Goldman et al., 1995)
Being adaptable and flexible: Assume multiple roles, Being multi skilled, having transferable balanced skill-set, being flexible in deploying different roles, and filling a number of potential future roles. Being able to quickly move between assignments and rapidly respond to changes	Flexible	Deploying multiple tasks (Sharifi and Zhang, 1999 ; Gunasekaran, 1999; Goldman et al., 1995)
		Professional flexibility: Ability and competence at working on different tasks in different teams simultaneously (Sherehiy, 2008; Zardeini and Yousefi, 2012:50; Asari et al., 2014)
		Require assumption of multiple roles to perform in different capacities across levels, and projects even external organisational boundaries both serially and simultaneously (Dyer & Shafer, 2003) Note: They call it an adaptive behaviour
Rapidly redeploy across the roles and move from one role to another very quickly (Dyer and Shafer, 1998:16 and 2003)		
Having peripheral vision: ability to scan the business horizon, and read the signals for what's happening, being perceptive, so understanding the wider perspective	Intelligence	Intelligence: Responsiveness to changes in customer needs and market conditions, Ability to read and interpret external change (e.g. In customer needs, market conditions, emerging business opportunities and competitor strategies),
Having Clear Thinking: Understands situations from all angles, have ability		

to make sense of data/situations, Makes useful links to arrive at insightful plans and solutions and make decisions		Ability to adjust objectives accordingly and to act speedily in line with the resulting strategic direction” (Breu et al., 2002)
Being Fast: able to make quick decisions, being fast paced and organised, have immediate reaction to changes, being quick in learning new skills and technologies	Quick	Speed of developing new skills required for business process change Rapid decision-making and execution Speed of acquiring the skills necessary for business process change Speed of innovating management skills Speed of acquiring new IT and software skills (Breu et al., 2002).
Being Collaborative and aTeam player: A desire to work collaboratively and supportively with colleagues and engage easily with cross-functional teams, proactively contributes to creating a good team atmosphere and focusing on achieving objectives of the teams.	Collaborative	Capability for collaborating effectively across project, functional and organisational boundaries (Breu et al., 2002) and in multi-lingual and geographically distributed workplace (Gunasekaran, 1999; Goldman et al., 1995; Dyer and Shafer, 1998:16; Sherehiy et al., 2007; Kidd, 1994; Forsythe, 1997)
Being Innovative: Willingness to experiment and explore different things, and being a proactive self-starter who try and find solutions	Innovative	About what they do and how they do it (Goldman et al., 1995) Innovate (moving beyond old solutions unless they truly fit); and learn (rapidly and continuously) (Dyer and Shafer, 1998:16) Having ability to generate innovative ideas (Plonka, 1997)
Having Drive to Deliver: having a desire to achieve and/or surpass standards of excellence and deliver business goals, initiating action and making timely decisions. Consistently delivers, Anticipates and overcomes obstacles by having concern for pace and completion Note: This attribute is partially consistent with proactive trait	Proactive	Proactive initiative: actively search for opportunities to contribute to organisational success and take lead in pursuing those that appear promising (Dyer and Shafer, 2003; Goldman et al. 1995)

<p>Proactively Initiate and Improve: Continuously improves processes and ways of doing things, being focused on adding value to the business, keep moving and don't stand still, never being comfortable and satisfied that good is good enough, constantly look for improvement opportunities, and set more challenging goals and targets</p>	<p>Proactive</p>	<p>Proactive initiative: actively search for opportunities to contribute to organisational success and take the lead in pursuing those that appear promising (Dyer and Shafer, 2003; Goldman et al., 1995)</p>
		<p>Proactive improvisation: requires devising and implementing new and creative approaches to pursuing opportunities and dealing with threats (Dyer and Shafer, 2003)</p>
		<p>Take initiative to spot threats and opportunities in the marketplace, reconfigure the organisational infrastructure to focus when and to where they are needed to deal with serious threats and opportunities, and learn (no waiting for permission or instructions to act) (Dyer and Shafer, 1998:16)</p>
<p>Personal Maturity and self-management: being self aware, having the ability to recognise their capability levels, motives and emotions and the triggers for those. The commitment and determination to grow and develop as a result of this awareness. Being confident, assertive and self assured and showing openness and honesty in all dealings</p>	<p>partially consistent with</p>	<p>Being resilient (Griffin and Hesketh, 2003) Change or modify themselves or their behaviours to fit new environment (Griffin and Hesketh, 2003)</p>
		<p>Comfortable with themselves, empathetic, comfortable with ambiguity, comfortable with paradox, and resilient (Dyer and Shafer, 1998: 17&18)</p>
<p>Effectively Communicate: Being articulate and able to communicate compellingly, Builds relationships and collaborates to solve problems</p>		<p>Interpersonal adaptability: (Pulakos et al., 2000)</p>
<p>Being Resilient: to deal with adversity, not giving up if something does not go right, but finding another way of doing it and keeping moving forward.</p>	<p>Resilient</p>	<p>Being resilient (Sherehiy et al., 2007)</p>
<p>Being Generative: having appetite to learn, having ability to learn fast and willingness to gather and develop new knowledge, share information and knowledge</p>	<p>Generative</p>	<p>Simultaneously learn in multiple competencies areas and educate by actively sharing of information and knowledge (Dyer and Shafer, 2003), Organisationally adept, open to experimentation, fast</p>

		learners and appliers of new knowledge, and team players (Dyer and Shafer, 1998: 17&18), Attitudes towards learning and self-development (Plonka, 1997; Goldman et al., 1995; Pulakos et al., 2000)
Being multi-skilled: Having transferable balanced skill-set	Skilled	Highly skilled (Kidd, 1994; Gunasekaran,1999; Abair, 1995; Forsythe, 1997; Gunasekaran, 1999; Goldman et al., 1995; Breu et al., 2002), Competent and empowered with necessary skills and capabilities to deal with turbulence in the market (Sharifi and Zhang, 1999)

6.2.3- RQ3. The Critical Role of HRM in Achieving Organisational Agility

One of the main aims of this study was to examine the role of HR in achieving organisational agility. The common ground in the conceptualisation of HR contributions in agility among previous authors has been around the development of the necessary ‘agile people attributes’. Dyer and Shafer (2003:53) articulated this as the main task of HR by suggesting that “the basic task of HRS is to foster... the employee mindset and behaviours required to achieve marketplace agility.” Dyer and Ericksen (2006), similarly, put workforce attributes at the heart of their HR strategy, while proposing a new way to conceptualise the notion of workforce attributes – named as “workforce scalability”. Consequently, the following categories of role for HR in agility development have been identified through the review of SHRM-agility literature:

1. Identifying and developing ‘workforce agility capabilities’ - the requisite skills, knowledge, mindset and behaviours for agility.
2. Managing(achieving) workforce scalability
3. Creation of a facilitative organisational context for agility. This includes:
 - a) Designing a supportive HR system (Dyer and Shafer, 2003)
 - b) Creation of a cultural foundation for agility
 - c) Helping to build an agility-oriented (a highly adaptable) organisational infrastructure

d) Developing leadership

The research findings provided considerable support for the importance of the identified HRM role in creating agility. However, the importance and criticality of these roles appeared different from the literature, so resulted in a new categorisation for HR key roles as follows.

6.2.3.1- Role 1. The Central Role for HR Is to Be a Strategic Business Partner

A common view amongst interviewees was that traditional HR functions which heavily focus on administrative tasks and enforcing standards and compliance, cannot meet the requirement of agile organisations. Findings from this study strongly suggest that HR, when seen as a strategic business partner, can play a significant role in agility development. This is consistent with the findings of Ananthram and Nankervis (2013) who suggested that HR in order to contribute to strategic agility needs to be considered as a strategic business partner, following the view of Francis and Keegan (2006), Ulrich et al. (2009 a,b) and Ulrich et al. (2012).

It is also in tune with the reports of Skinner and Mabey (1997) and Schuler and Jackson (2001) who outlined that a large number of authors are increasingly accentuating the more strategic and change-oriented competencies and roles for HR function (Boselie and Paauwe, 2005).

Shifting to an HR business partner role highlights the pivotal proactive role that HR function should play in co-crafting and the implementation of the firm's overall strategies as well as strategic (re) configuration of the HR system in a timely manner. The majority of the participating organisations have made a significant change in the purpose, focus and structure of their HR along with the shift into the HR business partner model in order to support fostering agility and innovation. One of the most supportive comments for this argument was: "*the HR role has changed from being order taker to a strategic facilitator*".

Although the initial conceptual framework of this research considered a leading role for HRM in agility development, the results of the study have challenged this assumption. Contrary to expectations, this study has found a disagreement about who should lead the agility programme. While a small number of participants suggested that an agility

programme should be led from the HR department, the majority argued that it is the responsibility of leaders, rather than HR, to lead the agility programme. According to the second group, it is not HR's job to deliver an agility programme, but HR should facilitate the change by acting as an enabler. **Hence, it could conceivably be suggested that the HR role in agility development is mainly a strategic facilitating role.**

6.2.3.2- Role 2. Developing a Human Capital Pool Possessing a Broad Repertoire of Skills, Knowledge and Behaviours (Workforce Agility Capabilities)

Four factors associated with this HR role identified from findings:

- 1- Speedy identification and development of necessary competencies
- 2- Speedy renewal of competencies to avoid skill obsolescence
- 3- Fast configuration and re-configuration of these competencies
- 4- Motivating and empowering employees to accommodate the fast and easy renewal of competencies and re-configurations and the overall manifestation of agile behaviours.

The first factor- identifying and developing an agility-oriented set of workforce attributes (combinations of skills, competencies and behaviours), has appeared to be a common theme within the interview findings and the HR- agility literature. This includes identifying and building the foundational skills, competencies and behaviours required for agility. The findings indicate that HR also needs to continually evaluate contextual information and reassess the necessary organisational and workforce capabilities in light of temporary strategic directions, and to evaluate whether the existing workforce capabilities can accommodate the requirements of the business, which is the second factor that is not widely covered within the HR-agility literature and conceptual models.

This is, however, consistent with the view of Drucker (1980) who argued that in turbulent environments, the obsolescence of capabilities accelerates. Therefore, accomplishing a growth strategy demands reskilling, or as put by Hamel and Prahalad (1994), needs 'unlearning'. This is also analogous with the concept of 'dynamic capabilities' advocated by Teece et al. (1997:516) and defined as an "ability to integrate, build and reconfigure internal and external competencies to address rapidly changing environments". Thus, in a rapidly changing turbulent environment, competency building and the speedy renewal of

competencies are equally important to achieve a dynamic fit with the changing business environment.

The findings show how HR function in the participating organisations had to re-evaluate their HR principles and reengineer and re-align the various components of HR systems including the issues of HR inventory, skills distributions, the practices-in-use to reflect the immediate strategic directions and situations and to provide foundations to create the required capabilities. This highlights the importance of the third factor-i.e. the configuration and re-configuration of competencies. This is in tune with the views of Johnston (2007) who asserts 'capability myopia', the inability to reconfigure competencies, compromise agility. Similarly, Eisenhardt and Martin (2000) argue that it is the configuration of capabilities that makes dynamic capabilities a source of competitive advantage.

The findings, in particular, highlighted the importance of crafting an agile talent management strategy which anticipates what may be going on in the business and bringing together the right interventions to enable the business to keep moving fast and being responsive to external changes through attracting, developing, and retaining multi-skilled agile people. Such an agile talent management strategy identifies current and future competency needs, including the required number of employees with certain types of skills as well as their collective competences, and develops a workforce plan based on accurate workforce data and human capital metrics. It utilises a variety of talent acquisition strategies including various sourcing and employer branding practices to target and proactively recruit suitable individuals with agile mindsets and the required skills in the employment market, or to develop their own talent pipelines by introducing apprenticeship programmes when skills are short.

Consistent with the views of Wright et al. (2001), who assert that just motivated and committed employees are able to utilise their skills toward better performance, the agile talent management strategy in the participating organisations also includes a wide range of employee motivation and retention interventions such as the application of flexible work models, effective mobility programmes, continuous development opportunities, empowerment, career coaching and developmental schemes to ensure that employees are given the appropriate opportunities to develop, progress and remain within the

organisation. This underlines the criticality of the fourth factor- motivating and empowering employees.

To increase employee motivation and involvement, many private organisations who contributed in the study, have moved from bureaucratic structures to self-managed autonomous teams who are empowered to set their own goals. Consistent with the concept of less bureaucracy and more autonomy is the view of Folz (1993), who asserts that the attainment of the required capabilities involves the alignment of the various subsystems such as structure and HR policies, for example by moving away from hierarchical structures to 'semi-autonomous' or 'self-directed' teams. This is also consistent with the argument of Sherehiy (2008) who believes that autonomous employees are the cornerstone of the agile organisation. However, as Norgaard (2001) suggested, the cultural shift from task driven authority and control to people and performance should not be underestimated.

Moreover, the findings explain how agile people attributes, and a broad repertoire of skills and knowledge can be developed by adopting a specific and aligned set of HR practices which have been described in Chapter Five and will be discussed in the next section. The findings show in particular, that among various HR practices; employee engagement, reward and recognition and the overall management approach are the integral parts of creating an agile culture as these directly influence the degree of employees' motivation to contribute a more discretionary effort.

In summary, the collection of HR principles, policies and practices should:

- ensure that employees have the required skills, knowledge and capabilities
- enhance their opportunities for new learning and development
- empower and motivate them through appropriate engagement practices to utilise their skills wherever business demands and to perform in an agile manner.

The interrelation between the three aspects of continuous capability development, provision of learning and development opportunities, and employee motivation is consistent with the view of Dyer and Ericksen (2006), who outlined three elements of Capability, Opportunity, and Motivation of employees (COM) as foundational for enhancing workforce fluidity. It is also consistent with the Ability–Motivation–Opportunity (AMO) model (Blumberg and Pringle, 1982; Gutteridge, 1983).

Overall, the outlined dimensions of the agile talent management strategy in the findings encompass the four HR dimensions (i.e. headcount, collective competences, deployment patterns and contributions) predetermined by Dyer and Ericksen (2006) as the issues that need to be managed by HR to achieve “workforce scalability”.

6.2.3.3- Role 3. Fostering Agile Culture, Promoting Agility-Oriented Mindset and Behaviours

The research identified the characteristics of a supportive organisational culture for agility, and the mindset and behaviours that agile organisations need to develop among their workforce. The findings also suggest that creating an organisational culture that values, recognises, rewards and enhances the behaviours required for organisational agility is the most important step in creating agility. The research results provided support for the importance of the HRM role in creating and maintaining an organisational culture that facilitates agility. However, the results were mixed. Some respondents argued that developing an organisational culture that supports agility is the mutual responsibility of HR and leaders, while others argued that cultural change is very much managed and driven by leadership and management.

Similarly, Crocitto and Youssef (2003) acknowledged the role of leadership and management in moving to an agile culture. They suggested that it is the leadership’s responsibility to establish the culture of agility which supports innovation, information sharing, and teamwork by integrating operational agility practices such as advanced manufacturing technology and virtual manufacturing, with organisational and people practices such as learning, participative decision-making styles, communication, and rewards for agile employees.

In the same way, findings from this research suggest that the many steps and components of a cultural change to agility are outside the direct influence and control of most HR functions. It is because, ultimately, it is leaders and management that are in direct communication with employees and that lead the changes, so they drive the reinforcement of an agile culture and engage the rest of the organisation. However, according to the interviewees, HR has a fundamental role to play which is outlined in Table 4.5.

It can be argued that the ultimate success in fostering and reinforcing an agile culture will require close collaboration between HR and leadership, which is the strategy that is being deployed in many of the leading organisations who participated in this study.

6.2.3.4- Role 4. Creating an Environment Which Facilitates Agility Development

The research identified that the HR role in agility development is mainly a strategic facilitating role. The insights from literature suggested that HR, in order to accommodate conditions to facilitate agility, needs to create a facilitative organisational context for agility by accomplishing these four responsibilities: a) Designing a supportive HR system, b) Creation of a cultural foundation for agility, c) Helping to build an agility-oriented organisational infrastructure, and d) Developing leadership.

The findings from interviews appeared in tune with the insights from literature. Interviewees both implicitly and more directly regard HR strategy and the subsequent HR system, as essential for an organisation with agile aspirations. The interview and observation findings suggest that their HR system is assembled from a combination of overarching people management principles, which will be discussed in section 6.3 (table 6.6), some formal HR policies, and a bundle of HR practices, which are fully presented in Chapter Five and will be discussed in the next section. Implicit within this finding is an assertion that HR function to facilitate agility is accountable for designing a supportive HR system. The characteristics and dimensions of a supportive HR system to strategic agility will be discussed and theorised as part of the research conceptualisation of agility-oriented HR strategy in Chapter Seven.

In relation to the role (b), the fundamental role that HR function can play in creating a cultural foundation for agility is discussed in the previous section. According to the majority of the participants, in effect, it is the leaders and managers who drive the reinforcement of agile culture and engage the rest of the organisation. Thus, it is the responsibility of leaders, rather than HR, to lead the agility programme, while HR acts as an enabler and strategic facilitator.

HR can support and empower managers to run agility, by developing and educating the leadership and creating a framework to enable autonomy and self-management. HR can also play a consultancy role as a business partner coach by promoting agility behaviours

among managers, providing them with the skills and tools which facilitate the development of team dynamics and agility transformations.

In other word, HR should focus much more on empowering and enabling managers to manage their teams as this is ultimately the managers' responsibility to manage, empower, engage and develop their teams. This could happen by creating a sense of purpose for the organisation, and assisting managers to translate that into the teams' and also individuals' objectives. The facilitating role should also be accomplished by developing a consistent, aligned set of HR practices and policies, guidance and tools which support managers in the development of themselves and their teams, and aiding them in managing their talent, resources and capabilities effectively. This is analogous with the role (d)-developing leadership, advocated by (Joiner and Joseph, 2007; Joiner, 2009) as a collective task of leaders and HR professionals.

Another facilitating role of HRM for agility, identified in the findings, is providing the environment that supports what agility needs. This refers to the environment that enables the organisations to detect and respond to changes ahead of competitors. It includes creating a climate of open and two-way communication with clear communication mechanisms and reporting structure. Such a communication framework provides a seamless flow of information, ensuring information and knowledge are shared across the business quickly and effectively and providing inputs for quick and accurate decision making.

The findings also indicate that HR can facilitate agility development only if other organisational infrastructure that are supportive to agility are in place. In particular, the importance of a fluid and flat organisational structure, an adaptable workplace design, agile information technology and knowledge sharing processes are underlined. This appears to reflect the role (c), supporting the view of Breu et al. (2001), Dyer and Shafer (2003), Sherehiy et al. (2007), Nijssen and Paauwe (2010) and CIPD (2014).

6.2.3.5- Role 5. Creating an Agile HR Function

The combination of the above findings has important implications for HR as a function, which is HR, in order to play a prominent role in agility development, must be agile itself. While this issue proves to be a common theme within the interviews, it is not widely covered

within the HR-agility literature. Thus, the fifth role of HR, creating an agile HR function, while regarded as highly important according to the interviewees, very little was found in the literature on the issues of HR structure and operational systems and processes supportive for agility. Thus, the findings related to this research question are among the key contributions of the study.

An implication of the discussed HR roles, is that HR needs to be business-integrated, data-driven, and completely proficient in fostering agile culture and in developing the required workforce capabilities through attracting, developing, and retaining agile people. This necessitates re-evaluating the required capabilities of the HR function. The majority of the participating organisations have made a significant change in the structure and organisation of their HR function along with the transformation in the purpose and roles of the function in order to support agility. The findings suggest that HR function needs to have an appropriate portfolio of competencies, to be able to anticipate what may be going on in the business and to bring together the right interventions to enable the business to keep moving fast and to be responsive to external changes.

What can be positively learned from the interviews is that the traditional and compliance-driven HR function which heavily focuses on administrative tasks cannot meet the requirements of agile organisations. HR, in order to effectively facilitate organisational agility, needs to bring agility to HR function itself, by deploying many of the agility-oriented practices such as continual development and flexible work design in the HR function. This is consistent with the view of Accenture (2013).

The characteristics and dimensions of an agile HR function are identified in response to the fourth research question in the next section.

6.2.4- RQ4. The Characteristics and Components of an Agile HR Function

HR, in order to effectively play the combination of the identified roles in agility development, must be agile itself. This necessitates a series of characteristics and competencies in HR function. With respect to the fourth research question, the findings from interviews identified three main components of an agile HR function including highly capable HR professionals with agile attributes, agile and flexible HR structures and work models, agile HR processes and operational system and efficient HR technologies.

Implicit within these findings is an assertion that an agile HR function is characterised by

- A highly flexible structure
- Profoundly capable HR professionals with a broad portfolio of competencies and agile attributes,
- Agile HR processes, operational systems and efficient HR technologies

The combinations of these elements enable the function to respond swiftly to various business scenarios and strategic directions and to perform a series of new roles and responsibilities.

6.2.4.1. Competencies of HR Professionals

When reviewing the last three decades of SHRM research, it can be seen that while the issue of HR competencies has been studied by a range of authors (such as Skinner and Mabey, 1997; Ulrich, 1997; Brockbanck and Ulrich, 2002; Schuler et al., 2003; Boselie and Paauwe, 2005), it has been more investigated with respect to the relationship between HRM and performance. The issue of what HR competencies are necessary for agility and how they can contribute to organisational responsiveness and flexibility have not been discussed.

The agility imperatives necessitate a series of skills and competencies for HR professionals. The research findings indicate the required competencies of HR professionals in order to effectively play their new roles as outlined in the previous section. These include knowledge, skills, and the attributes of individual HR professionals and the collective competencies of HR teams.

They need to act as business partners and impact at a strategic level, while being able to quickly modify, adapt and implement the agile bundle of HR practices. Thus, they are expected to deeply understand business needs and organisational contexts, possess the knowledge of required skills and desired agile attributes of employees, as well as knowledge of the HRM practices necessary to promote those skills and attributes. In addition, they need to have capabilities for quick and strategic HRM decision making and implementation. This is fully consistent with the views of Wright and Snell (1998) in introducing the requirements for achieving fit and flexibility in SHRM.

HR professionals should also have a broad portfolio of competencies, to be able to anticipate what may be going on in the business environment, be able to adapt to that and bring together the right interventions to enable the business to keep moving fast and to be responsive to external changes. It can therefore be suggested from the findings that a key component of an agile HR function is the competencies of HR people. Thus, continuous capability development and increasing the skills of the HR teams should be an essential step of any HR transformation to agility. This is consistent with the views of Bersin (2013), who intensified the importance of ‘upskilling’ in the HR and L&D teams. It also corresponds with the view of Ulrich (1997) who highlights the significance of the development of HRM professionals.

Findings also indicated that these development programmes should equip HR professionals to better understand business and strategy, the human implications of business issues encompassing areas such as: business acumen; change management; culture management; coaching and consulting; adopting; and embracing the latest advancement in both administrative and strategic aspects of HR such as HR technology, software systems and web-enabled HR service delivery, social media and analytics. These domains of competencies are partially consistent with the findings of Ulrich (1997), whose findings also include personal credibility, measurement of the HR impact, intangible assets and globalisation, issues that did not appear as significant among the research findings here.

6.2.4.2. Agile and Flexible HR Structures and Work Models

This study identified that a strategic business partner model for HR is a supportive HR work model for agility development, supporting the views of Ananthram and Nankervis (2013). This seems to contradict the view of Accenture (2013), who suggests that agility may need a more flexible HR model than traditional centres of excellence and HR business partners to allow more fluidity in the work design of HR professionals.

The business partner model, however, has been widely applied by both local government service organisations as well as private sector companies and has been perceived as beneficial to organisational agility. The majority of the participating organisations have made a significant change in the purpose, roles and structure of their HR to facilitate agility. As their HR transformation evolved, they have moved from a reactive people

transactional services function to a proactive strategic business partner by reengineering their HR model to the Ulrich's Business Partner Model aiming to become more business-aligned and strategic in nature.

The benefits of the model in relation to organisational agility are outlined by participants as:

- 1- Enabling HR to make the contribution required for agility creation
- 2- Enabling HR to adopt a strategic and proactive approach towards business needs and internal and external demands
- 3- Allowing senior HR professionals to spend more time on critical business issues, as the standardisation and automation of repeatable HR processes have reduced the proportion of their time which used to be spent on administrative activities or giving operational support to line managers;
- 4- Enabling HR professionals to work on exploitation of agility capabilities such as flexibility, innovation, creativity, quality and profitability
- 5- Allowing HR professionals to focus on strategic tasks and have closer collaboration with operational managers on achieving business objectives.
- 6- Reducing HR operating costs - a measureable advantage of the business partner model, as the centralised HR structure with no operational duplication requires far less overhead than their previous decentralised model
- 7- Increasing the consistency in the delivery of HR services.

The outlined benefits appear to have a high degree of resonance with the advantages presented by Dalziel et al. (2006) associated with the application of the HR business partnering model.

Moreover, Beatty (2005) believes that outsourcing the HR tactical tasks increases HR agility by enabling HR to refocus on strategic tasks. However, the participants had a contrary view on the outsourcing issue, suggesting that only a limited number of HR activities are suitable for outsourcing such as payroll, and the majority of the activities even at tactical level cannot be outsourced easily, as HR needs to be close to the business, and the issues that managers and people encounter.

6.2.4.3. Agile HR Process and Operational System, and Efficient HR Technologies

Although HR needs to become more strategic and business-driven, administrative operations are still vital parts of HR. The findings of the study highlighted that an efficient operational system is a vital component of an agile HR function which brings agility into the HR operations.

Participating organisations have started to take advantage of a new generation of HR software systems, human capital management technologies, analytics, and online and mobile applications in line with reengineering their HR models. As they have transformed from a traditional HR structure into a more strategic, agile and business-integrated HR, they were being expected to provide more integrated and value-adding service to line managers with better access to accurate data for faster decision-making.

HR self- service technologies are reported as playing a fundamental role in this transformation. Almost all of those participating organisations, which adopted HR business partnering models or moved to a central HR services model (shared services), use integrated self-service technologies. HR self- service technologies are reported as bringing many benefits to the organisations. These include removing duplications, and consequently a reduction in HR costs, a greater speed of HR service delivery, and a releasing of time that can be spent on strategic issues.

Moreover, they not only brought operational effectiveness and agility to HR administrative operations, but also are used as platforms for knowledge and information sharing, workforce planning and analytics, online education and mobile training solutions, social recruiting, continuous goal-setting, performance assessments and continuous feedbacking, and rewards and social recognition. Furthermore, HR analytics is regarded as beneficial in making informed business decisions. It is because, it provides access to accurate workforce data and meaningful business intelligence which mirrors the views of Beatty (2005) and Accenture (2013). It can thus be suggested that an integrated HR technology system is also an essential component of an agile HR function which enhances the agility of HR processes.

6.2.5- RQ5. Agility-Oriented HR practices

Findings from this study suggest that achieving agility requires multi-skilled, committed, empowered and accountable employees who work collaboratively with colleagues and engage easily with cross-functional teams, and proactively contribute in delivering business goals. The findings also indicate that these people attributes can be developed by adopting a specific and consistent set of HR practices which are horizontally aligned and collectively aimed at fostering agility mindset and behaviours and developing a broad repertoire of skills and knowledge.

This aim which interlinks and integrates all HR activities is the pursuit of recruiting adaptable people with the right mindset, making them feel valued and developed, and retaining them long term. It is also overtly evident from the interviews that the participating organisations planned their HR practices and activities in a way to achieve the highest degree of vertical fit by pursuing a series of agility-oriented HR principles congruent with their business strategies. Although none of the organisations have explicitly developed an agile HR strategy prior to their agility development, they have incrementally made significant changes in the purpose, focus and structure of their HRM to support agility, and subsequently, agile HR strategy and its components, particularly agility- oriented HR practices, have emerged over time along with organisational journeys towards agility.

A series of agility- oriented HR practices which were deployed and perceived by the participating companies, as having the greatest effect on organisational agility and cultivation of agile attributes, are identified. These practices are classified into nine major areas of HR which largely correspond with the categories identified in the literature. These include work design, learning and development, performance management, staffing, talent management, employee engagement, empowerment, communication, and rewards and recognition. Of the ten categories of HR practices identified in the literature, only ‘employee/labour relations’ did not appear to carry significance among interviewees, contrasting with the findings of Shafer’s (1997) who stressed the importance of heavy union involvement in building shared vision and creating a positive employee relations environment to foster change and prevent resistance to change. However, interviewees despite being reverent to the importance of the employee relations, which appeared in

different categories (such as employee involvement, leadership and management approach), did not consider a critical role for union involvement in agility development.

The findings highlight a series of distinctive characteristics for HR practices in organisations trying to create agility. These characteristics for the nine major areas of HR are categorised and compared with the literature in Table 6.4, which is mainly designed to present the consistency between the findings from the study and previous literature. The identified contradictions and further observations from the findings will be discussed after table 6.4.

Table 6.4- Agile HR Practices - Comparing the findings with the literature

HR Domain	Characteristics of HR practices in organisations attempting to create agility- summary of the findings	Consistent with the findings/views of:
Work Design	<ul style="list-style-type: none"> •Work design is based on a fluid and flexible job description that allows people to freely deploy and redeploy roles 	<p>Flexible job profiles, blended work assignments, flexible work assignments and cross-trained teams, Broad job description (Dyer and Shafer, 1998; Lengnick-Hall et al., 2011)</p> <p>Fluid Assignments (Bridges, 1994; Shafer, 1997; Dyer and Shafer, 1998 and 1999; Dyer and Shafer, 2003; Shafer et al., 2001; Lengnick-Hall et al., 2011)</p>
	<p>Work design gives individuals discretion and responsibility over how to meet customers' requirements and how to achieve their targets most effectively</p>	<p>Discretionary-based work design (Dyer and Shafer, 2003; Shafer et al., 2001)</p>
	<ul style="list-style-type: none"> •Roles are defined in a way that people have freedom over how to deal with certain situations, so that they are well positioned to manifest agile behaviours. •Works are designed/redesigned by individuals and self-managed autonomous teams who set their own goals. The process of defining detailed job descriptions and individuals' objectives are dealt with at a team level rather than by management on top or HR department. 	<p>Higher job control/autonomy (Sherehiy, 2008)</p>
	<ul style="list-style-type: none"> •People are involved in cross-functional, reconfigurable multi-functional teams through which works are performed. •People are assigned to different projects based on their skills rather than assigning them functionally. 	<p>-Project teams, Team working, self-directed teams, cross-functional teams</p> <p>Dyer and Shafer (2003); Shafer et al. (2001); Sharp et al. (1999), Sharifi and Zhang (1998, 2001), Zhang and Sharifi (2000), Gehani(1995), Gunasekaran (1999, 1998), Gunasekaran and Yusuf (2002), Yusuf et al. (1999), Sahin (2000), Jin-Hai et al. (2003),</p>

		<p>Meredith and Francis (2000), Goldman and Nagel (1993) ; Fliedner and Vokurka (1997); Lengnick-Hall et al. (2011)]</p> <p>-Multidisciplinary team working environment by (Medhat and Rook (1997), Gunasekaran (1998), Gunasekaran and Yusuf (2002) and Vernadat (1999))</p>
	<p>Different forms of practices such as flexible assignment, job rotation and secondment are deployed to cross-train and move people between different functions, projects and tasks. These practices highly develop employees' skill repertoire and improve their retention.</p>	<p>Job rotation, multifunctional workforce, job enrichment(responsibility on multiple tasks), broadening job scope (Gehani (1995), Gunasekaran (1999), Forsythe (1997), Sahin (2000) and Jin-Hai et al. (2003); Peterson, et al. (2003); Sumukadas and Sawhney (2004))</p>
	<p>•Agile working approach, the notion of working anytime, anyplace, and anywhere, is widely deployed. It assimilates different flexible and adaptive practices across two dimensions of time and location, to integrate people, property and technology to establish the optimal workforce and broaden the talent pool. (new)</p>	<p>New</p> <p>*Partially consistent with the view of Dyer and Shafer (1998) about Flexible working policies such as flexitime, job sharing and telecommuting</p>
	<p>Detailed, prescriptive and fixed job descriptions are inhibitive to agility as they constrain people from being adaptive, assume multiple roles and collaborate cross-functionally</p>	<p>Broad job description (Dyer and Shafer, 1998; Lengnick-Hall et al., 2011)</p>
Staffing	<ul style="list-style-type: none"> Recruitment process and selection criteria search for people with agile attributes. 	<p>Careful selection based on value congruence, selection based on workforce agility attributes (Dyer and Shafer,1998 and 2003; Shafer et al.,2001; Plonka, 1997; Lengnick-Hall et al., 2011)</p>

	<ul style="list-style-type: none"> The majority of participating organisations hire for attitude first then skills, because they believe they can develop employees’ skills, knowledge and experience over the time. However, some companies which produce highly complex products using high-tech manufacturing facilities or companies which face intense competition in attracting high-skilled engineers and scientists, have to place high value first on candidates’ technical skills rather than following the “hire for attitude first” principle. 	Careful selection based on value congruence, Selection based on workforce agility attributes (Dyer and Shafer (1998 and 2003); Shafer et al. (2001); Plonka (1997); Lengnick-Hall et al. (2011))
	<ul style="list-style-type: none"> Access to workforce data provides accurate and meaningful business intelligence which is essential in making quick and informed business decisions. 	<ul style="list-style-type: none"> Access to centralised workforce data (Shafer ,1997; Beatty, 2005)
Talent Management	Facing a challenging recruitment environment because of intense competition for talent, they invest significant resources in talent management to attract, develop and retain talent. These include:	Invest in human capital (Lengnick-Hall et al. (2011))
	<ul style="list-style-type: none"> Investing in employment branding 	Developing a unified employer brand (Beatty, 2005)
	<ul style="list-style-type: none"> Using broader recruiting sources such as social media to advertise their vacancies. 	Broad recruiting sources (Lengnick-Hall et al., 2011)
	<ul style="list-style-type: none"> Developing their own talent pipelines by introducing more apprenticeship programmes 	New
	<ul style="list-style-type: none"> <u>Conducting continuous recruiting</u> processes as opposed to reactive recruiting to ensure a diverse range of experiences, mindsets and competencies are always available in the workforce. 	Continuous employment: invest in human capital (Dyer and Shafer, 2003; Shafer et al., 2001)

	Utilising a range of employee retention programmes	-Retain core employees (Shafer (1997); Dyer and Shafer (1998)) -Retain strategic talents: Develop explicit ‘competency growth models’ for them Differentiating pay, development, assignments and retention for them (Beatty, 2005)
	○ Developing a flexible work model to ensure employees have a healthy work-life balance	Minimize voluntary turnover: Offering: - freedom, flexibility, excitement, and opportunities - competitive pay packages Minimize layoffs or otherwise the effects of layoffs: deploy Equitable severance and outplacement programs (Dyer and Shafer (2003))
	○ Ensure that core employees have a development and progression path so that they can grow in their roles or progressing towards another role ○ Mechanisms exist for internal hiring, so that information about position openings and career opportunities is widely shared internally	Career progression Internal hiring, information about emerging opportunities shared internally (Dyer and Shafer, 1998)
	○ Developing effective <u>Mobility Programme</u> which - Share and release talent between business units - Encourage employees to move within the organisation and switch roles - Support employees in developing their potential to the full based on their career aspiration	Mobility programme: provide opportunities for competency development (Dyer and Shafer, 1998)
Training and Development	L&D Strategic Goals:	
	• L&D strategy and opportunities are aligned to the organisation’s strategic direction, the business plan, the	New: None of the previous works suggested a strategic L&D for agility development

	workforce plan, the vision, values, and desired behaviours and outcomes	
	<ul style="list-style-type: none"> L&D strategy has both proactive and reactive approach to learning and development of employees. While L&D react to the needs stemming from competencies gaps and business, teams and individual needs, they are also business-integrated which proactively address marketplace and business imperatives and competitive strategies. 	New
	<ul style="list-style-type: none"> The main aim of L&D is to build a strong learning culture that supports ongoing learning in which employees have every opportunity to grow and develop to achieve their full potential from the beginning throughout the entire of their careers 	Promoting personal growth by Shafer et al. (2001), and Growth (Continuous development) by Dyer and Shafer (2003)
	<ul style="list-style-type: none"> L&D strategy includes all categories of employees and provides every employee with the learning tools and solutions that support their ongoing learning, continuous skills and capability development, and continuing progress in their careers. 	Development programmes include all categories of employees (Goldman et al. (1995); Dyer and Shafer (1998)) Continuous training and development, [Dyer and Shafer (1998, 2003); Shafer et al. (2001); Zhang and Sharifi (2000), Gunasekaran(1999), Gunasekaran and Yusuf (2002), Yusuf et al. (1999), Sahin (2000), Jin-Hai et al. (2003), Goldman and Nagel (1993), Flidner and Vokurka (1997), Hormozi (2001), Meade and Sarkis (1999), Maskell (2001); Yao and Carlson (2003); Gehani (1995); Nagel and Dove (1992); Goldman et al. (1995); Lengnick-Hall et al. (2011)]
	<ul style="list-style-type: none"> L&D programmes are integrated with performance management and talent management strategies inorder to develop employees to their full potentials. 	New
	<ul style="list-style-type: none"> Employees have ultimate responsibility for their own development, while managers provide an ongoing 	Responsibility for development rests with individual (Shafer (1997); Dyer and Shafer (1998))

	support to their teams to create their own tailored development programme. The continuous performance management process ensures that employees receive regular feedback on their progress.	
	<ul style="list-style-type: none"> • Employees are encouraged to learn multiple competencies and to educate their colleagues by actively sharing information and knowledge. 	Cross-training and Job rotation (Gunasekaran(1999); Yusuf et al. (1999); Sharp et al. (1999); Sanchez and Nagi (2001); Hopp and Oyen (2004); Sumukadas and Sawhney (2004); Nijssen and Paauwe (2012); Qin et al. (2015))
	<ul style="list-style-type: none"> • Companies have an online e-learning portal. All employees have access to extensive learning resources and online/offline training programmes for their own personal, technical and professional development 	New
	<ul style="list-style-type: none"> • Employees are encouraged to work towards membership of professional bodies governing their specialism or work area. 	New
	Content and Focus of Learning and Development:	
	<ul style="list-style-type: none"> • L&D solutions focus on developing agile attributes. L&D identifies capabilities and behavioural priority areas and the gaps that are necessary to be covered in order to create workforce agility 	New
	<ul style="list-style-type: none"> • L&D programmes embed core values and emphasis is on desired behaviours and outcomes and common performance metrics 	Focus on shared values, common performance metric, managing change, marketplace, competitive strategies, financial matters (Shafer (1997); Dyer and Shafer (1998))
	<ul style="list-style-type: none"> • The content of the L&D programmes is focused on competitive strategies and promoting innovation. There is a constant emphasis on increasing customer satisfaction and shareholder value. 	New
	<p>L&D programmes include the foundations of</p> <ul style="list-style-type: none"> • Managing change: a combination of educating people 	New

	<p>about the changes that are going to happen and the reasons for them, and then providing them with the skill sets to be able to implement those changes.</p> <ul style="list-style-type: none"> • Systematic approach to solving problems • Questioning techniques and sharing innovative ideas without fear of failure • Entrepreneurship which helps people become more business driven and knowing the market and customer requirements • Self-management and self-leadership capabilities 	
	<p>L&D solutions provide professional development to managers including various managerial sessions around the performance management process, change and managing change, leadership and staff engagement, building resilience and flexibility, coaching, leadership development, developing and leading virtual team</p>	New
Training and Development (Continued)	L&D Activities Design: There is a range of various L&D opportunities on offer which include:	
	<ul style="list-style-type: none"> • Sufficient and comprehensive induction programme • Internal coaching or mentoring 	New
	<ul style="list-style-type: none"> • Formal external/internal training course and practical support • Professional qualifications 	Heavy investment in education , training and development (Shafer (1997); Dyer and Shafer (1998); Bahrami et al. (2016))
	<ul style="list-style-type: none"> • Lunch and learns practice: informal peer-to-peer learning in which employees with expertise in a particular subject educate other colleagues 	Team-to-team learning (Gunasekaran and Yusuf (2002))
	<ul style="list-style-type: none"> • Knowledge-sharing 	Encourage knowledge sharing (Lengnick-Hall et al., 2011)

	<ul style="list-style-type: none"> • Learning sets or networking groups, social learning 	Communities of practice to nurture collective intelligence (Dove (2001); Cohen and Prusak (2001); Dyer and Shafer (2003); Shafer et al. (2001))
	<ul style="list-style-type: none"> • Job rotations and cross-training • Lateral secondments/ movements 	Hopp and Oyen (2004); Sumukadas and Sawhney (2004)
	<ul style="list-style-type: none"> • Action learning with other people in similar positions • Job shadowing /observing • Self-learning: providing books, DVDs and on demand e-learning tools, and access to extensive online learning resources • Project works /assignments 	<p>Training on the fly: learning that takes place on assignment and on the spot, often through Web-based or other types of self-study programs, often done in employees' own time</p> <p>Just-in-time training: individualised on-line instruction</p> <p>Action learning (Dyer and Shafer (2003); Shafer et al. (2001); Dyer and Shafer (1998))</p>
	<ul style="list-style-type: none"> • Conferences and seminars • Professional memberships and access to external events 	Knowledge acquisition from internal and external sources (Jin-Hai et al. (2003); Maskell (2001))
	<ul style="list-style-type: none"> • Broadening job responsibilities to stretch employees personally and professionally 	Job enrichment(responsibility on multiple tasks), broadening job scope (Gehani (1995), Gunasekaran (1999), Forsythe (1997), Sahin (2000) and Jin-Hai et al. (2003); Peterson, et al. (2003); Sumukadas and Sawhney (2004))
Performance Management	<ul style="list-style-type: none"> • Performance metrics (KPIs) include some measures that relate to agility 	New
	<ul style="list-style-type: none"> • Performance expectations reflect desired workforce behaviours and shared values. Accordingly, goal-setting and performance measurement/review are about both what/how people deliver, both KPIs and behaviours 	Focused on shared values (Shafer (1997); Dyer and Shafer (1998))
	<ul style="list-style-type: none"> • Goal-setting is around common performance metrics that avoid conflicting functionally-oriented assessments 	Pursue a set of common goals across organisation, goal-setting around common performance metrics (Shafer (1997); Nagel and Dove (1992); Goldman et al. (1995))
	<ul style="list-style-type: none"> • Performance system and goal-setting focus on individual 	Commitment management protocols (Dyer and Shafer (2003))

	contributions to team and organisational success	Ownership of Outcomes (Dyer and Shafer (2003); Shafer et al. (2001))
	<ul style="list-style-type: none"> Performance system emphasizes contributions in outputs and outcomes rather than tasks and presenteeism 	Results-based appraisals (Lengnick-Hall et al. (2011))
	<ul style="list-style-type: none"> A continuous performance appraisal and employee feedback is developed: they revise goals more frequently and have regular conversation with employees to provide them with real-time and informal performance related positive or negative feedback. 	Provide real-time and continuous feedback (Shafer (1997); Dyer and Shafer (1998); Youndt et al. (1996))
	<ul style="list-style-type: none"> Performance system is closely linked to talent management and learning and development, so it identifies learning opportunities and potentials in the short-term 	New
	<ul style="list-style-type: none"> Performance system is linked to pay and reward and recognition 	New
	<ul style="list-style-type: none"> Performance system encourages for positive peer review and in some firms 360-degree reviews 	Positive peer review, 360-degree reviews (Shafer (1997); Dyer and Shafer (1998))
Employee Communication	<ul style="list-style-type: none"> Having a clear organisational structure and communication framework is essential for creating workforce agility. Some organisational structures facilitate communication more than others 	New
	<p>Communication includes:</p> <ul style="list-style-type: none"> Communicating marketplace and business status regularly (both positive and negative issues) informs employees about the urgency to change which is crucial in achieving employees' engagement Communicating shared values, business plans and 	Open book management (Dyer and Shafer (2003); Shafer et al. (2001))

	<p>objectives, common performance metrics, the brand image, global and the regional strategies, organisation's overall and local performance results, competitors' status, all information from customers and business partners, and all information about the changes that may affect employees</p> <ul style="list-style-type: none"> • Managers communicate with their teams where things do not work effectively, so employees can see it as a learning exercise rather than negative experience. • 	
	<p>Communication Principles:</p> <ul style="list-style-type: none"> • Create a climate of open and two-way communication with clear communication methods and reporting structure. 	<p>-Surround communication (Dyer and Shafer (2003); Shafer et al. (2001))</p> <p>-Open information/communication environment (Shafer (1997); Gunasekaran (1999, 1998); Gunasekaran and Yusuf (2002); Yusuf et al. (1999); Meredith and Francis (2000); Meade and Sarkis (1999) and Maskell (2001); Lengnick-Hall et al. (2011))</p>
	<ul style="list-style-type: none"> • Channels of bottom-up communications are available for employees to ask questions or clarify and understand different issues. • Channels of top-down, side-to-side and inside-out communication are also available: Such as regular road shows where board members do presentations to staff regularly 	<p>-Top-down: frequently communicating business information (both positive and negative), common performance metric, shared value , information from customers and alliance partners</p> <p>- Upward and lateral: employees across organisational levels and boundaries encouraged to share information (Shafer (1997); Dyer and Shafer (1998))</p>
	<ul style="list-style-type: none"> • Employees are encouraged to share their knowledge, information and suggestions on different matters: the knowledge-sharing processes are designed in a way that 	<p>Encourage knowledge sharing (Lengnick-Hall et al., 2011)</p>

	ensure information and knowledge are shared across the business quickly and effectively.	
	<ul style="list-style-type: none"> • Employees are encouraged to have social interactions and there are formal and informal mechanisms such as ‘community of practices’ and ‘social networks’ which facilitate those interactions. 	Continuous socialization (Lengnick-Hall et al. (2011))
	<p>Communication Mechanisms</p> <p>They employ a wide range of communication mechanisms which include:</p> <ul style="list-style-type: none"> • Person to person verbal and face to face conversations, regular monthly/weekly/daily group meetings, emails, intranet, electronic forums, company video, newsletters, notice boards and electronic bulletin boards • Corporate social networking websites such as ‘Connections’ where senior leaders and managers communicate with their employees through blogs, updates, forums, online conferences • Virtually borderless workplace and open architecture eliminate organisational borders and connect employees and allows more communications and collaboration 	<p>Communication mechanisms : electronic forums, e-mail, intranets, electronic bulletin boards, meetings, surveys, chat groups (Shafer (1997); Dyer and Shafer (1998))</p> <p>Open architecture (Lengnick-Hall et al. (2011))</p>
Employee Engagement	<p>Employee involvement mechanisms that are being used to boost employee engagement:</p> <ul style="list-style-type: none"> • Employee forums: where they consult with employees and update colleagues on a regular basis. • Consultation and engagement activities such as 	<p>Employee involvement (Sharp et al. (1999), Sharifi and Zhang (1998, 2001, 1999), Zhang and Sharifi (2000), Gehani (1995), Gunasekaran (1999, 1998), Gunasekaran and Yusuf (2002), Forsythe (1997), Yusuf et al. (1999), Gehani (1995), Sahin (2000), Meredith and Francis (2000), Goldman and Nagel (1993) and Flidner and Vokurka (1997))</p> <p>Employee suggestions (Lengnick-Hall et al. (2011); Sumukadas and Sawhney (2004))</p>

	<p>employee opinion surveys, people insights team, employer listening team, quality of working life committees,</p> <ul style="list-style-type: none"> • Suggestion scheme: where people can post ideas. • Ideas sessions: where they encourage people to have ideas and to have innovation and enterprise. They facilitate those ideas to come into fruition 	
	<ul style="list-style-type: none"> • Motivation: Employees’ motivation comes from personal satisfaction, self-actualisation and empowerment. They believe people are more motivated when they feel more responsible, more valued, and trusted. They motivate people by helping them to understand their critical role in delivering business objectives and KPIs, by developing them and understanding and helping them to move towards their career aspirations. <p>Leaders and managers: at the time of changes they make sure that they are thinking about and taking account of employees’ ideas</p>	New
Empowerment	<ul style="list-style-type: none"> • Empowerment, which delegates more decision-making to individuals and teams, is critical for employee involvement and crucial in achieving agility. 	<p>-Empowerment (Sharp et al. (1999), Sharifi and Zhang (1998, 2001, 1999), Zhang and Sharifi (2000), Gehani(1995), Gunasekaran (1999, 1998), Gunasekaran and Yusuf (2002), Forsythe (1997), Yusuf et al. (1999), Gehani (1995), Sahin (2000), Meredith and Francis (2000), Goldman and Nagel (1993) and Fliedner and Vokurka (1997); Lengnick-Hall et al. (2011))</p> <p>-Decentralised decision making (Yusuf et al. (1999), Goldman and Nagel (1993) and Maskell (2001); Lengnick-Hall et al. (2011))</p>
	<ul style="list-style-type: none"> • Agility is not about micro managing. Without 	Focus on macro-management, Employees inspects their own

	empowerment and delegation of authority, decision making process will be very slow.	performance. (Goldman et al. (1995))
	<ul style="list-style-type: none"> • They distribute authority and power based on expertise rather than hierarchical position. 	Power sharing (Sumukadas and Sawhney (2004))
	<ul style="list-style-type: none"> • They create a climate of trust and interdependence and reinforce organisational citizenship and personal accountability. 	-Build relational rather than transactional relationships with employees. (Lengnick-Hall et al. (2011))
	<ul style="list-style-type: none"> • Performance management framework support empowerment principles by providing people with the freedom for experimentation within the boundary of meeting their performance expectations 	Experimentation (freedom to fail) Lengnick-Hall et al. (2011)
	<ul style="list-style-type: none"> • They promote empowerment by introducing training sessions and coaching development programmes to develop self-management and self-leadership capabilities. They teach people to be self-starters, and support leaders to change their leadership approach 	Develop self-management and self-leadership capabilities.(Lengnick-Hall et al. (2011); Sumukadas and Sawhney (2004))
Reward And Recognition	<ul style="list-style-type: none"> • Continuous rewards and recognition 	New
	<ul style="list-style-type: none"> • Rewards and recognition practices embed agility-oriented behaviours: Reward and motivate employees for demonstrating agile people attributes • Reward mechanism which is mismatched with agility-oriented behaviours is counterproductive to agility 	<ul style="list-style-type: none"> • Recognition and awards for taking on challenging assignments , for rapid learning, for acquiring new skills, for modelling agile behaviour, for sharing useful information (Shafer (1997); Dyer and Shafer (1998, 2003); Shafer et al. (2001)) • Reward agility-promoting behaviours (McCann et al., 2009; Glinska et al., 2012)
	<ul style="list-style-type: none"> • Rewards and recognition is linked with performance and behaviours management, L&D and talent management practices 	New
Range of applied rewards and recognition practices:		

	<ul style="list-style-type: none"> • On-the-spot recognition 	Dyer and Shafer (1998)
	<ul style="list-style-type: none"> • Sharing ownership: Share save and Profit sharing 	Profit sharing, stock options (Dyer and Shafer (2003); Shafer et al. (2001); Goldman et al (1995); Sumukadas and Sawhney (2004); Crocitto and Youssef (2003))
	<ul style="list-style-type: none"> • Team-based rewards system 	<p>Compensation based on time, rate, and group performance on bottom line (Goldman et al (1995))</p> <p>Group-based performance incentives: Recognise and reward teamwork ,</p> <p>Rewards and measures of success or objectives are based on individual and group performance (Goldman et al (1995); Youndt et al. (1996); Sumukadas and Sawhney (2004); Lengnick-Hall et al. (2011))</p>
	<ul style="list-style-type: none"> • Benefits reflect the full value of employees' skills, experience and qualifications. They continuously encourage employees to develop and grow and their benefits and bonuses improve as they grow 	Skill, knowledge or competency -based pay (Goldman et al (1995); Gómez-Mejía and Balkin (1992); Youndt et al. (1996); Lawler et al. (1992); Murray and Gerhardt (1998); Sumukadas and Sawhney (2004); Dyer and Shafer (1998))
	<ul style="list-style-type: none"> - Traditional monetary rewards and benefits: competitive salaries, personal holiday entitlement, an award-winning pension scheme, tax-and NIC-advantageous salary sacrifice schemes, pensions and childcare vouchers - Discounts on company's products - Provide negotiated discounted prices or cash back on their everyday shopping at featured retailers - Retirement Plan - a defined contribution scheme providing pension and life benefits - Non-monetary incentives or recognition: gifts, celebrations, dinners. - Focus on social responsibility: show concern for the 	Reward schemes to encourage innovation and based on both financial and non financial measures (gifts, publicity and dinners) (Gunasekaran (1998); Sumukadas and Sawhney (2004))

	<p>employees' families, invest in the communities where they live</p> <ul style="list-style-type: none">- Flexible working hours and the option to work remotely, where appropriate- Social rewards and recognition tools: online reward and recognition system where peers can feedback on their colleagues' contributions and recognise the areas of improvement in their performances. Customers can also recognise employees' adaptive behaviours or their outstanding jobs- Establish Thank You system as part of corporate culture- L&D opportunities: exposure on projects getting recognition for contributions.- Career progression opportunities: promote employee mobility	
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6.2.5.1. A Note on the Comparison of AOHR Practice: Findings Vs Literature

As can be seen in Table 6.4, for the 5 out of 9 domains of HR practices, the comparison of the findings with the previous works indicates the continued relevance of the agility-oriented practices, mainly identified within the studies of Dyer and Shafer, to the organisations of this study. Some important points are observed in relation to the issues of work design, staffing and talent management, and training and development, which are discussed in the following sections.

Work Design:

Dyer and Shafer (1998) consider work design as the central HR activity in agile organisation impacting considerably on other HR activities such as selection criteria, performance appraisals, and training and development. The issue of work design, similarly, achieved the same significance within this research and emerged as one of the key HR aspects facilitating agility and resource fluidity with the interviewees particularly highlighting the need for higher job freedom and autonomy to manifest agile behaviours. When looking at the various factors supporting fluid work design, association (correlation) between work design, autonomy and empowerment, a flat structure and participative management approach, and learning to facilitate multi-tasking are becoming evident.

The findings from the study generally reveal a common perspective of the nature and design of work appropriate for agility, which is highly consistent with the views of previous authors (see Table 6.4). Almost all interviewees from both public and private sectors stressed the importance of fluid and flexible job descriptions, discretionary-based work design, higher job control and autonomy, reconfigurable multi-functional projects-based teams, flexible assignments, job rotation, secondment and cross-training in achieving workforce alignment and fluidity. The issue of higher job control and autonomy, however, is one of the factors that most divides the practices between local government and private sector organisations. Although the participants from both groups share the same views about the positive impact of job control and autonomy on agility, empowering local decision-making is not such a straightforward agenda at local government organisations as implied for private sector and manufacturing organisations. This is

because they have to be more bureaucratic and hierarchical and have formal schemes of delegation due to the political nature of the organisations.

One contrasting element with the literature is the issue of ‘eliminating non-core activities through outsourcing or off-shoring’ suggested within the Goldman et al. (1995) and Beatty (2005) research, as none of the interviewees associates agility with outsourcing, while stressing that HR needs to be close to the business to better understand the issues and to respond to them quickly.

In addition, agile working, the notion of working anytime, anyplace, and anywhere, emerged as a widely deployed approach among participating organisations within local council, public and private service organisations. Participants attached a series of benefits to the implementation of agile working. Most importantly, in relation to organisational agility, it is reported that agile working enables quicker responses and a more customised delivery of services as well as closer team working and collaboration, thus, increasing organisational responsiveness and flexibility.

This approach, while it did not appear as significant within the previous agility research, is partially consistent with the view of Dyer and Shafer (1998) about flexible working policies such as flexitime, job sharing and telecommuting. This finding also resonates with the CIPD report (2014), where strong evidence about the benefits of agile working is reported including its impact on enhancing workforce alignment and agility, increasing productivity, and improving talent attraction and retention.

Staffing and Talent Management:

Of the all staffing and talent management practices posited by previous authors, congruence with agile attributes, heavy investment in human capital and talent management, access to centralised workforce data, continuous recruiting, broadening recruiting sources, and utilising a range of employee retention programmes appear to carry most significance, based upon the experience of the participants. The issue of selection is based on congruence with agile attributes and the principle of “hiring for attitude first then skills” is one of the applied practices that divides the participating organisations. While, this was the common practice among the majority of participating organisations, consistent with the views of (Dyer and Shafer, 1998 and 2003; Shafer et al., 2001; Plonka, 1997; Lengnick-Hall et al.,

2011), companies producing highly complex products and using high-tech manufacturing facilities or companies which face intense competition in attracting high-skilled engineers and scientists, have to place a higher value first on candidates' technical skills rather than following a "hire for attitude first" principle.

In many cases, the issue of skill shortage has led to the development of their own talent pipelines by introducing apprenticeship programmes, which is a practice not identified in previous agility works. Moreover, the findings do not highlight a significant bias to the strategic use of a contingent workforce which would appear to contradict the findings of Shafer (1997), Dyer and Shafer (1998), Beatty (2005) and CIPD (2014). While the data stresses the importance of proactive workforce planning which predicts and accommodates the future demands for the workforce, the use of a contingent workforce, what CIPD (2014) called agile resourcing, did not appear as associated with agility. The participants mainly indicated issues such as lack of sufficient engagement and concerns about the inconsistency of the training and development across different categories of employees as the reason for not using a contingent workforce.

Training and Development

Most of the training and development practices identified in the previous works as appropriate for agility development, include: continuous training and development of all categories of employees; focusing on shared values; common performance metric; managing change; marketplace; competitive strategies and financial matters; the application of a various range of L&D methods such as cross-training ;job rotation; communities of practice to nurture collective intelligence ; training on the fly; web-based and self-study programs; just-in-time training; action learning; all are widely experienced and implemented by the majority of the companies and similarly perceived as supportive for developing agility. Contrary to the literature and the strong emphasis of Dyer and Shafer (1998) on expanding learning and development opportunities beyond organisational boundaries to cover employees of suppliers, customers, and partners in virtual organisation; it was found to be implemented in only a small number of participating companies. This could be interpreted as the lack of strategic intent to the adoption of the 'socio-ecological perspective' in the overall strategy making of the organisations.

Comparing the insights from the findings and the literature shows commonality within the characteristics of L&D practices suggested in the literature and what implemented in practice at the firms who contributed in this research. However, the relative importance of overall training and development strategies differs across previous works and the findings of this research. The participants attached greater importance to the development of an agile L&D strategy which is aligned to the organisation's changing strategic directions, the business plan, the workforce plan, the vision, values, and desired behaviours and outcomes. They emphasised that the main aim of L&D strategy is to build a strong learning culture that supports ongoing learning in which employees have every opportunity to grow and develop to achieve their full potential from the beginning throughout the entirety of their careers. This research identified a number of characteristics and dimensions for L&D strategy (see Table 6.4), which are not fully covered in the previous works.

6.2.5.2. Further Observations and Discussions on AOHR Practices

Overall, as organisations of study have moved toward agility, their HR strategies have evolved and many of their traditional HR principles and practices have been changed, in line with the changes in their organisational hierarchical structures, their leadership approach and overall organisational culture. What is becoming increasingly evident within the organisations of the study are four important factors in relation with HR practices:

First, the notion of continuity:

Organisations pursuing agility plan and implement HR activities and practices “continuously” rather than “episodically”. HR to act “at the speed of opportunity” and facilitate fast and easy (re)configuration of resources, need to adopt continuous recruiting; frequent goal setting; continuous performance appraisal and provision of real-time feedback to employees; continuous learning and development; continuous rewards and recognition; continuous communication and ongoing adoption of employee involvement mechanisms to get employees engaged.

Moreover, the process of work (re)design should be seen as an ongoing practice rather than an episodic task. This research discusses that even a review and renewal of the HR activities and practices should happen continually. While this is not a general conclusion

deriving from the previous works, some examples of this notion can be extracted from the previous research:

- Continuous training and development, (Dyer and Shafer, 1998, 2003; Shafer et al., 2001; Zhang and Sharifi, 2000; Gunasekaran, 1999; Gunasekaran and Yusuf, 2002; Yusuf et al., 1999; Sahin, 2000; Jin-Hai et al., 2003; Goldman and Nagel, 1993; Fliedner and Vokurka, 1997; Hormozi, 2001; Meade and Sarkis, 1999; Maskell, 2001; Yao and Carlson, 2003; Gehani, 1995; Nagel and Dove, 1992; Goldman et al., 1995; Lengnick-Hall et al., 2011)
- Continuous employment (Dyer and Shafer, 2003; Shafer et al., 2001)
- Provide real-time and continues feedback (Shafer, 1997; Dyer and Shafer, 1998; Youndt et al., 1996)
- Continuous socialisation (Lengnick-Hall et al., 2011)

Second, horizontal alignment:

The study findings suggest that in organisations pursuing agility, the HR practices in the nine HR domains must be integrated and aligned with each other (horizontally). This is fully consistent with the findings of Shafer (1997), who found strong support for the notion of systematic and ongoing alignment and realignment of various HR activities. In the same vein, the existence of a HR strategy regarded as necessary by the participants to direct the selection of these practices and to link the various aspects of HR activities in pursuit of a common purpose which is creating organisational agility capabilities and fostering agile people attributes. This aim interlinks and integrates all HR activities and components of the HR system and infrastructure in pursuit of building an agile mindset and behaviours.

Thus, none of the identified AOHR practices can guarantee agile behaviours in isolation. They all need to be applied in harmony and to support each other in promoting the agile behaviours and none of the practices should act as a barrier for the rest. This also resonates with the finding of CIPD research (2014a) which suggests for employees to adopt new behaviours instead of following the existing organisational 'rules', it is necessary to align organisational environment and systems and elements such as structures and processes with the purpose of training and leadership interventions.

Third, the existence of different types of agility strategies within a firm and the importance of continual strategy-HRM practice fit

The findings from observations suggest that HR functions must be able to quickly, easily and effectively reconfigure people competencies and realign HR practices as business situations change. While there was not sufficient evidence to support the systematic realignment at a point in time, there was adequate data highlighting the importance of a systematic and continuous reassessment of business conditions and the suitability of people competencies.

This tends to be more in tune with the views of Werbel and DeMarie (2005) who assert that person–environment fit is a connecting pin between vertical and horizontal alignment in SHRM, which resonates with the issue of agile people attributes - environment fit that appeared as important in the findings. Further, they proposed to achieve superior performance, HR systems should be vertically linked with corporate strategies through organisational competencies, and to ensure those distinct organisational competencies are promoting, HRM practices should be horizontally aligned.

Thus, it can be asserted that HR practices also need to be continually aligned and realigned with desired agile attributes which are subject to change due to the dynamic of the business environment and changing nature of business strategies and directions (dynamic vertical fit). There was general support in the findings for this assertion, however, the organisations tend to approach this in an implicit and unarticulated manner (or emergent way) rather than a systematic way.

While overall, the concept of fit between strategy and HRM practices is not a new subject in SHRM, the dynamic of desired agile attributes and the issue of continual realignment of HR practices with the changing requirements of the business environment and the changing nature of business strategies and directions were not sufficiently covered in the previous models of HR agility. It is, however, to some extent consistent with the notion of coordination flexibility of HRM practices as conceptualized by Wright and Snell (1998) - defined as the extent to which HRM practices can be quickly, effectively and efficiently resynthesized, reconfigured and redeployed to be consistent with a firm's strategic needs. Wright and Snell (1998) stressed the impeding effect of structural inertia (Astley and Van de Van, 1983) pointing to the issues of bureaucracy, institutionalisation, corporate

regulations and political processes which may cause the inertia of HRM practices.

Therefore, agility with regards to HRM practices may require a continual reassessment of business conditions (agility drivers), and re-evaluation of the suitability of individual and bundles of HRM practices in relation with the required organisational and workforce competencies and capabilities.

Fourth, Intra-organisational differences in deployed bundles of Agility-Oriented HR Practices related the existence of different types of agility strategies across the firms:

One important findings derived from the synthesis of interviews, data and observations, is that each organisation stressed particular HR practices over others. Further case-based investigations were conducted to identify the underlying causes of this variation. A cross-case analysis discovered that the choice of HR practices is very much related to the requirements of their overall strategies, which in turn are the subjects of their unique business environments, the nature of their markets and the intensity of competition, as well as the characteristics of the products or services for each organisation.

It is outlined in chapter four that the characteristics and the extent of environmental pressures (or agility drivers) experienced by each organisation, while sharing some commonalities, vary for different organisations performing in different sectors. Therefore, each organisation's approach to creating agility was variegated due to the distinctive agility drivers they are facing, and the different agility capabilities and various set of agile attributes that were pursued in different organisations. Consequently, organisations in different sectors adopted different (agility)strategies by focusing on organisational capabilities which correlate to their unique circumstances, goals and objectives.

The existence of different types of agility strategies across the participating organisations, and the consequent focus on various sets of agility capabilities are in tune with the findings of Zhang and Sharifi (2007) who identified three distinct clusters of agility strategies as quick, responsive and proactive, shaped by pressures from the business environment, each of them considering the development of a unique set of agility capabilities as Table 6.5 shows. Similar arguments are proposed within the work of Goranson (1999), which are also shown in Table 6.5.

Table 6.5. Three distinct clusters of agility strategies identified by Zhang and Sharifi (2007) and Goranson (1999)

Clusters of agility strategies identified by Zhange and Sharifi (2007)	Clusters of agility strategies identified by Goranson (1999)
Quick Players are oriented towards a strong customer focus and quickness. They do not emphasize flexibility and responsiveness to changes and they give low priority to proactiveness and partnership.	agility 1: features the ability to satisfy and be close to customers
Responsive Players are preoccupied with flexibility and responsiveness to changes. They do not emphasize proactiveness and partnerships and they attach low importance to quickness.	agility 2: corresponds to the capability to thrive in changes that may be anticipated
Proactive Players are characterized by high priorities on proactiveness and customer focus, high values attached to all capabilities, and high importance given to partnerships.	Agility 3: refers to the ability to cope with unanticipated changes.

Similarly, this study identified various agility strategies where different organisational and workforce capabilities were required that had to be created by different AOHR practices. Although, most of the agility capabilities, received a high level of emphasis by the participants, in practice level, the relative importance attached to each agility capability and the corresponding workforce capabilities and HR practices was different across the cases. Thus, various HR practices are used to implement their strategies.

For instance, the local councils which share a considerable economic pressure from austerity as their key agility driver, have mainly focused on improving efficiencies and increasing workforce productivity and sustainability. Thus, HR practices in the areas of work design, performance management, employee communication and empowerment have been highlighted as important. In contrast, private service and manufacturing companies, which face significant challenges from an increasing rate of product innovation, changes in technology, and intense competition for talents, placed more emphasis on HR practices in the areas of talent management, learning and development, and employee engagement.

This would generally appear consistent with the contingency perspectives and fit approach in SHRM, suggesting that the choice of a particular bundle of HR practices is dependent upon an organisation's strategy (Miles and Snow, 1984; Schuler and Jackson, 1987; Lengnick-Hall and Lengnick-Hall, 1988; Baird and Meshoulam, 1988; Jackson et al., 1989; Wright and Snell, 1998). This is particularly in tune with the findings of Jackson et al. (1989), who similarly found intra-organisational differences in HR practices, as one of

the earliest empirical studies showing a relationship between HR practices and business strategy and other organisational context characteristics such as industry sector, innovation strategy, and organisational size and structure. In a similar vein, Delery and Doty (1996) related the issue of the variation in HR practices across organisations to the organisations' strategies, asserting that organisations that have a greater match between their HR practices and their strategies yield better performance.

Putting these two final findings together, the study was not only faced with the existence of different types of agility strategies across the participating organisations, but also within a firm at different points in time, which both resulted in variations in the adoption of HR practices. This can be related to the agility strategy framework proposed by Sharifi (2014), in which he proposed that the strategic response to the contextual situations can be one or a combination of a range of agility postures including reactive, responsive and proactive.

It can be argued that an organisation's decision in relation to the adoption of the appropriate bundle of AOHR practices is dependent on the firm's strategic agility postures where different organisational and workforce capabilities are required that have to be created by different combinations of HR practices.

It can also be derived that agile HR strategy is a highly contextualised system of decisions, as HR strategic choices can take different forms according to different agility postures in response to the various degrees and nature of internal and external contingencies.

6.3. Further Key Findings Regarding AOHR Strategy

Although the main focus of the study, and consequently the purpose of research questions was to build an understanding about content aspects of AOHR strategy, due to the inductive nature of the study, some key issues in relation to formulation aspects of HR strategy (process aspect) have been also found mainly through observations. These key findings are reported here along with a synthesis of the findings into a conceptualisation of AOHR strategy.

While the interconnection between HR strategies and strategic agility is not fully speculated in the SHRM-agility literature, the participants, both by implication and also

more directly, outlined the criticality of HR strategy and the significant role of their strategic HRM in creating organisational capabilities for agility.

A synthesising argument would be that strategic agility changes HR function's responsibilities and focus. Therefore, HR's role changes from order taker and implementer of rules and enforcer of controls to co-crafting the firm's strategies and facilitating organisational agility by the use of an AOHR strategy. The critical roles of HR function are also identified as developing workforce agility capabilities, fostering agile culture, creating an environment which facilitates agility development and creating an agile HR function. While these roles clarify the content of an AOHR strategy to a great extent, there are some central issues that direct the overall contribution of HR function in agility. These issues are the strategic aims behind the HR strategic choices.

The desired agile culture and mindsets and behaviours and a human capital pool with a broad repertoire of skills, knowledge and capabilities appeared as the pivotal aspects of HR strategy in the participating organisations. These findings are similar to the conceptual constructs of HR strategy models proposed by (Dyer and Shafer, 1998, 2003; Shafer et al., 2001; Dyer and Ericksen, 2006). In their pursuit of accomplishing these two umbrella responsibilities, the HR investments and activities in participating organisations have been focused on a series of HR principles, to a great degree corresponding with the agility-oriented HR principles proposed in the extant literatures, and directing the selection and deployment of the firms' HR policies, investments, and practices. These AOHR principles, are outlined in Table 6.6, along with their corresponding HR practices.

Table 6.6: The AOHR principles identified from findings

AOHR principles identified from findings & their consistency with AOHR Principles from literatures	Corresponding HR practices from findings
<p>Creating and maintaining the agile culture, establishing a shared mindsets and values that pivot around accountability, empowerment, trust, openness, change readiness and responsiveness, flexibility and adaptability, collaboration, and teamwork</p> <p>consistent with Embedding core values by Shafer et al. (2001)</p>	<p>Recruitment process and selection criteria search for people with agile attributes</p>
	<ul style="list-style-type: none"> • L&D strategy and offers are aligned with the vision, values, and desired behaviours and outcomes • L&D aim is to build a strong learning culture that supports ongoing learning • L&D solutions focus on developing agile attributes. L&D identifies capabilities and behavioural priority areas and the gaps that are necessary to be covered in order to create workforce agility • L&D programmes embed core values and an emphasis on desired behaviours and outcomes and common performance metrics • L&D programmes include the foundations of: <ul style="list-style-type: none"> - Questioning techniques and sharing innovative ideas without fear of failure - Entrepreneurship which helps people become more business driven and knowing the market and customer requirements - Self-management and self-leadership capabilities
	<p>Performance expectations reflect desired workforce behaviours and shared values. Accordingly, goal-setting and performance measurement/review are about both what/how people deliver, both KPIs and behaviours</p>
	<p>Rewards and recognition practices embed agility-oriented behaviours: Reward and motivate employees for demonstrating agile people attributes</p>
	<p>Employ a wide range of communication mechanisms to communicate shared values</p>
<p>Creating a strong sense of shared purpose consistent with Drive (Common purpose) by Dyer and Shafer, (2003)</p>	<p>Effective Goal-setting and performance management: Goal-setting is around common performance metrics that avoid conflicting functionally-oriented assessments</p> <ul style="list-style-type: none"> • Performance system and goal-setting focus on individual contributions to team and organisational success in achieving the strategic objectives and core values
	<p>Leadership: Communicating shared values, business plans and objectives, common</p>

	<p>performance metrics, the brand image, global and regional strategies, overall and local performance results, competitors' status, all information from customers and business partners, and all information about the changes that may affect employees</p>
<p>Reinforcing Accountability consistent with Accountability and Ownership of outcomes by Dyer and Shafer (2003)</p>	<p>Aligning incentive and engagement practices with the strategic vision and purpose: Continuous rewards and recognition reward and motivate employees for their contribution in achieving the strategic objectives</p> <p>They create a climate of trust and interdependence and reinforce organisational citizenship and personal accountability.</p> <ul style="list-style-type: none"> • Goal-setting is around common performance metrics that avoids conflicting functionally-oriented assessments • Performance system and goal-setting focus on individual contributions to team and organisational success <p>Performance system is linked to pay and reward and recognition</p>
<p>Assuring strategic and contextual clarity: enhancing employee understanding of marketplace dynamics and organisational vision and strategic intents consistent with Achieving contextual clarity by Shafer et al. (2001) and Discipline (Contextual clarity) Dyer and Shafer (2003)</p>	<p>Communicating marketplace and business status regularly (both positive and negative issues) informs employees about the marketplace situations and its dynamics, as well as the urgency to change which is crucial in achieving employees' engagement</p> <p>Creating a transparent system of information about organisational goals, projects, workforce skills and capabilities</p> <p>L&D programmes include the foundations of Managing change: a combination of educating people about the changes that are going to happen and the reasons for them, and then providing them with the skill sets to be able to implement those changes.</p>
<p>Re-design work, job, and career-path to ensure fluidity and flexibility is consistent with Enriching work by Shafer et al. (2001) and Autonomy (Fluid assignments) Dyer and</p>	<p>Work design is based on a fluid and flexible job description that allows people to freely deploy and redeploy roles</p> <ul style="list-style-type: none"> • Work design gives individuals discretion and responsibility over how to meet customers' requirements and how to achieve their targets most effectively • Roles are defined in a way that people have freedom over how to deal with certain situations, so that they are well positioned to manifest agile behaviours.

<p>Shafer (2003)</p>	<ul style="list-style-type: none"> •Works are designed/redesigned by individual and self-managed autonomous teams who set their own goals. The process of defining detailed job descriptions and individuals’ objectives are dealt at a team level rather than by management on top or HR department. •People are involved in cross-functional, reconfigurable multi-functional teams through which works are performed. •People are assigned to different projects based on their skills rather than assigning them functionally. •Different forms of practices such as flexible assignment, job rotation and secondment are deployed to cross-train and move people between different functions, projects and tasks. These practices highly develop employees’ skill repertoire and improve their retention. •Agile working approach, the notion of working anytime, anyplace, and anywhere, is widely deployed.
<p>Reinforcing a learning culture with a focus on continuous learning and development consistent with Promoting personal growth by Shafer et al. (2001), and Growth (Continuous development) by Dyer and Shafer (2003)</p>	<p>Foster mobility by</p> <ul style="list-style-type: none"> • Share and release talent between business units • Encourage employees to move within the organisation and switch roles <p>Different forms of practices such as flexible assignment, job rotation and secondment are deployed to cross-train and move people between different functions, projects and tasks. These practices highly develop employees’ skill repertoire and improve their retention.</p> <ul style="list-style-type: none"> •L&D strategy has both proactive and reactive approach to L&D of employees. While L&D react to the needs stemming from competencies gaps and business, teams and individual needs, they are also business-integrated which proactively address marketplace and business imperatives and competitive strategies. •The main aim of L&D is to build a strong learning culture that supports ongoing learning in which employees have every opportunity to grow and develop to achieve their full potential from the beginning throughout the entirety of their careers •L&D strategy includes all categories of employees and provides every employee with the learning tools and solutions that support their ongoing learning, continuous skills and capability development, and continuing progress in their careers. •L&D programmes are integrated with performance management and talent management

	<p>strategies in order to develop employees to their full potential.</p> <ul style="list-style-type: none"> • Employees have ultimate responsibility for their development, while managers provide an ongoing support to their teams to create their own tailored development programme. The continuous performance management process ensures that employees receive regular feedback on their progress. • Employees are encouraged to learn multiple competencies and educate their colleagues by actively sharing information and knowledge. • Companies have an online e-learning portal. All employees have access to extensive learning resources and online/offline training programmes for their own personal, technical and professional development • Employees are encouraged to work towards membership of professional bodies governing their specialism or work area. <p>Performance system is closely linked to talent management and learning and development, so it identifies learning opportunities and potentials in the short-term</p> <p>Rewards and recognition is linked with performance management, and L&D</p>
<p>Continuous recruiting to ensure a diverse range of experiences, mindsets and competencies are always available in the workforce consistent with Continuous employment by Dyer and Shafer (2003)</p>	<p>Invest significant resources in talent management to attract, develop and retain talent by:</p> <ul style="list-style-type: none"> • Investing in employment branding • Using broader recruiting sources such as social media to advertise their vacancies. • Developing their own talent pipelines by introducing more apprenticeship programmes <ul style="list-style-type: none"> • Conducting continuous recruiting processes as opposed to reactive recruiting to ensure a diverse range of experiences, mindsets and competencies are always available in the workforce. • Utilising a range of employee retention programmes
<p>Remove bureaucracy and move to self-managed autonomous teams Consistent with Sherehiy (2008)</p>	<ul style="list-style-type: none"> • Promote empowerment by introducing training sessions and coaching development programmes to develop self-management and self-leadership capabilities. They teach people to be self-starters, and support leaders to change their leadership approach • Performance management frameworks support empowerment principles by providing people with the freedom for experimentation within the boundary of meeting their performance expectations

This research also identified that the participating organisations' approach to AOHR strategy formulation was a more emergent approach in which HR strategies and its components developed to a large extent in an emergent and evolutionary way over time, while some degree of planning was involved along with the deliberate pursuit of strategic agility at organisational level. It was mainly due to a wide range of factors and contingencies that affected the HR strategy formulation process. This was contrary to the researcher's expectation presuming that agility requires a detailed proactive planning of HR strategy. This is, however, consistent with the views of Brown and Eisenhardt (1998: cited in Shafer et al 2001)) who recommend unpredictable environments demand a middle ground between detailed planning and unbridled emergence.

It is also in tune with the view of Weber and Tarba (2014) who assert that tensions exist between formal processes of strategic planning and opportunistic strategic agility, with criticism of strategic planning because of relying on past actions, concepts, and tools which produces an inertia that inhibits fast adaptation.

It is interesting to note that Harness (2009), who identified two main approaches to strategy making in SHRM naming as the matching (Fombrun et al., 1984) and the Harvard (Beer et al., 1985) approaches, reported the rise of emergent HRM policies making, which substituted formal planning mechanisms. The Harvard approach argues that strategy cannot always be planned for, in line with the assertion by Mintzberg and Lampel (1999) who suggest that "there is often a formal intended strategy and also an emergent one that comes about on an informal basis" (Harness, 2009:322)

Correspondingly, none of the participating organisations have explicitly developed a specific HR strategy named as agile HR strategy prior to the implementation of their agility programme. Instead, they have incrementally made significant changes in the purpose, focus and structure of their HRM in order to support fostering agility and innovation. As part of these HR transformations, agile HR strategy and its components, particularly agility- oriented HR practices, have emerged over time along with the organisational journey towards agility. In other words, their HR strategies/systems co-evolved along with their business strategies.

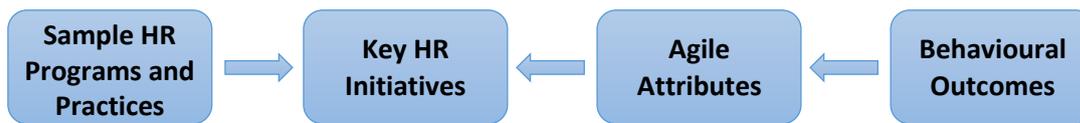


Figure 6.1: The process Model for AOHR strategy suggested by Shafer et al (2001:200)

The sequence of these incremental changes in HRM, relatively, follows the strategy formulation process proposed by Shafer (2001) as shown in Figure 6.1. For instance, the new HR system at Council 1 aimed to create adaptability, agility, creativity, and commitment in its employees. So, implicitly defined a set of new core values, and a misty picture of the desired agile culture, as well as the expecting behavioural manifestations. Accordingly, they have revised their behavioural framework and performance and development review process to give people the freedom to use their talent and creativity and become more engaged and committed. The change in the purpose of HR and behavioural framework was followed by reengineering many traditional HR practices at the organisation. They have also changed their work designs and job descriptions, talent management strategy, learning and development, and leadership development practices which were explained in detail in the previous chapters. Thus, an agility-oriented HR system has emerged over time in response to the external and internal situations. This observation is consistent with the view of Shafer et al (2001) who assert that organisations pursuing agility should consider plenty of room for experimentation.

6.4 Summary of the Chapter

This chapter attempted to synthesise the research findings and to provide an interpretation of them in light of the research questions and the previous literature. It discussed how the findings of the research answer each of the research questions and how these answers fit in with the existing knowledge on the HRM-Agility topic. Thus, the main agreements and differences between the literature and the findings of this research are discussed. The next chapter will discuss the implications of the research key findings for the conceptual framework and present the updated conceptual framework of AOHR strategy.

CHAPTER SEVEN
A CONCEPTUAL FRAMEWORK FOR
AGILITY-ORIENTED HUMAN RESOURCE STRATEGY
(AOHRS)

7.1 Introduction

This chapter builds on the findings of previous chapters, including a conducted review of the literature, as well as the insights obtained from the empirical study and aims to propose the research conceptual framework for AOHR strategy as the third objective of the research. A preliminary conceptual model of AOHR strategy, presented at the end of chapter two, was developed after an initial review of the literature.

Adopting the perspective of ‘progressive focusing’ (Sinkovics and Alfoldi, 2012), the research design allowed a cyclical process of going back and forth between the theoretical framework of the research, the literature and the emergent themes coming from the data. Thus, the preliminary framework has been gradually modified and reshaped through an iterative process during the course of the exploratory research, as insight from the empirical part of the study and the newly identified literature enriched the researcher understanding and consequently informed the framework.

To shorten the discussion, this chapter selectively presents and compares the framework in its initial stage with the final model, revised after a synthesising of the research findings. It summarises the implications of the findings for the preliminary model, and explains the main modifications to the model.

This includes a brief discussion on the major issues with regards to agility-oriented SHRM to introduce the building blocks of the conceptual model. After that, a definition of SHRM suitable for an uncertain business environment and its underlying assumptions will be provided. The updated conceptual framework for AOHR strategy is then introduced in more detail, and the interrelationships and connections between different components of the model induced from the findings are discussed.

The chapter also proposes how HR strategy in organisations performing in uncertain and turbulent business environments should be formulated and implemented. At the practice level, it discusses how people management principles and practices should be adopted. At the functional level, it disputes how HR as an organisational function should embrace the concept of agility in its structure/ operations model and arrangement/competency mix of its team members.

7.2 The Modifications to the Preliminary Framework

The preliminary conceptual framework of AOHR strategy was developed after an initial review of the literature, built on the foundation of Zhang and Sharifi’s agility model (2000) and on the basis of the HRS model for agile enterprises proposed by (Shafer et al., 2001). The main constituent parts of the framework were identified as agility drivers, workforce agility capabilities, and HR agility providers. The framework was built on the six basic assumptions as introduced in Chapter Two. (see section 2.9)

The preliminary model and the updated framework are presented in Figure 7.1 and 7.2, respectively, for comparison. The three major components of the preliminary model - agility drivers, workforce agility capabilities, and HR agility providers, still form the main constituent parts of the updated framework, however, they are configured in different ways along with the identification of additional elements to each component. The framework still follows the six indicated assumptions, but the key findings of the research added a new theoretical basis to the underlining premises of the framework. The following sections attempt to provide a component by component comparison of the preliminary and updated model:

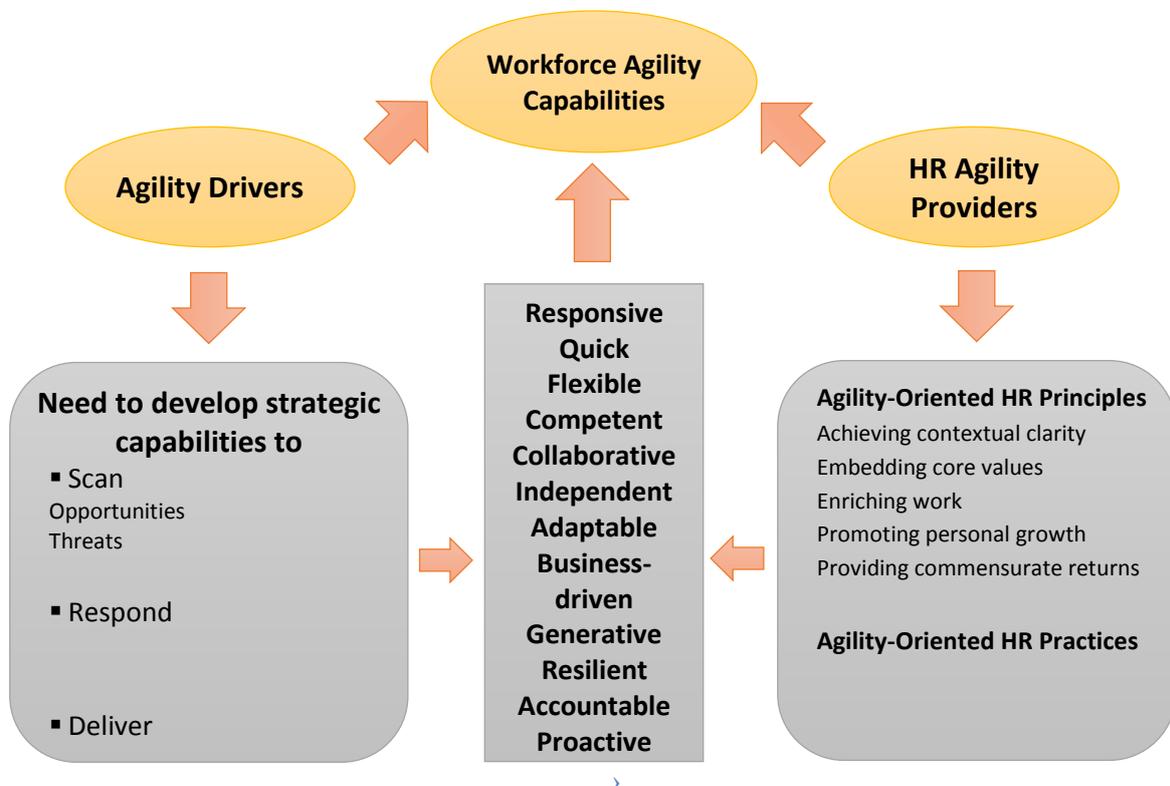


Figure 7.1- Preliminary Conceptual Framework for AOHR Strategy

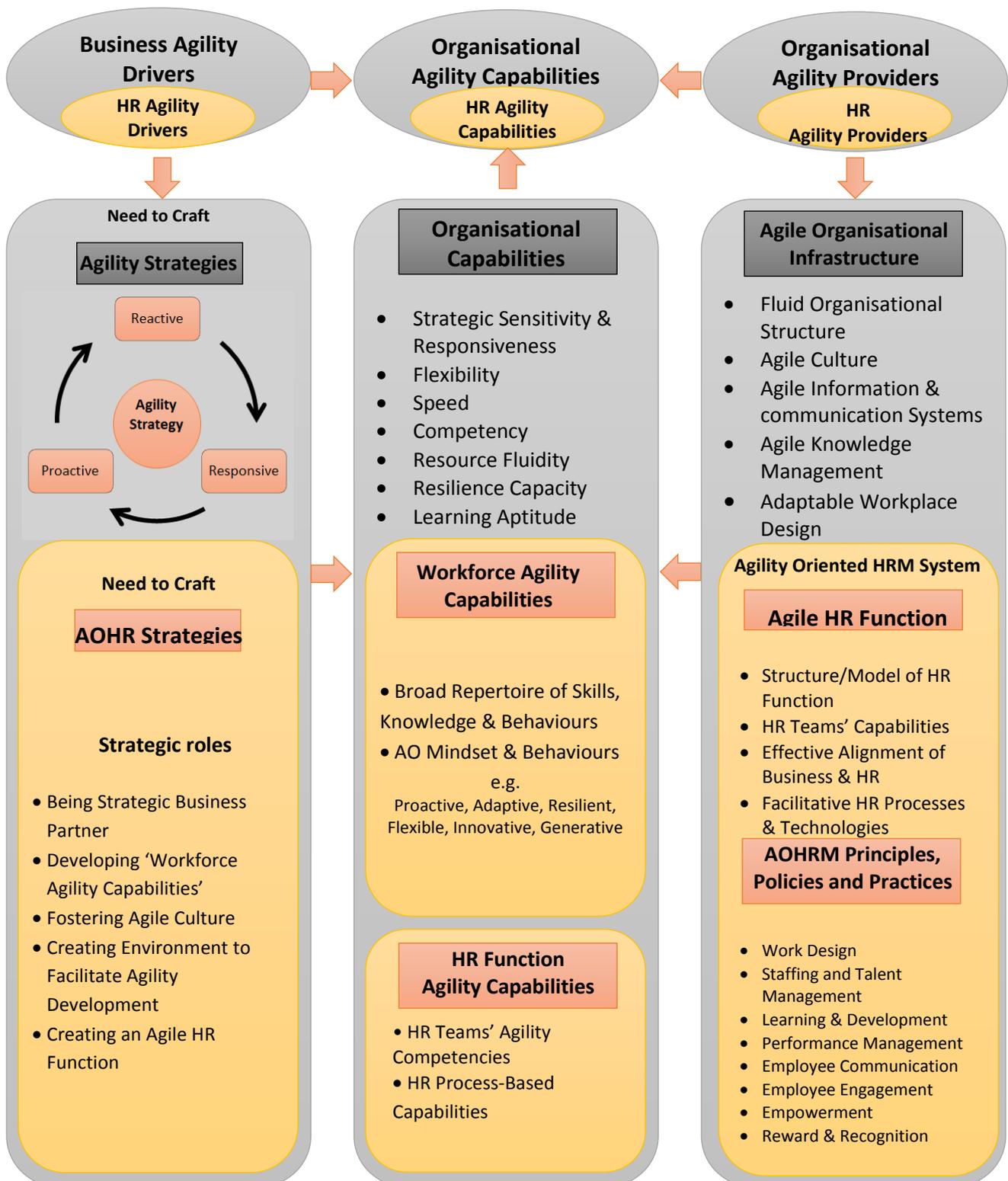


Figure 7.2. The updated conceptual model for agility-oriented SHRM

7.2.1 Agility Drivers and HR Agility Drivers

As discussed in Chapters Four and Six, the findings support the number 5 assumption of the original model by indicating that the nature and extent of the agility drivers vary from organisation to organisation, especially across different sectors and industries. This diversity results in a variation in the required organisational and workforce capabilities.

It also became evident that while the business agility drivers such as changes in customer requirements, technologies, social-legal factors impact upon HR too, there are some drivers that specifically affect HR. These include the accelerated changing needs of the workforce, the intense competition for talent, the increasing value placed on human capital due to performing in the knowledge economy and the technological changes which influence the way, where and when employees live and work. Hence, a new dimension, *HR agility drivers*, has been added, as an integral part of the overall business agility drivers, in order to specifically alert HR professionals about the challenges that they need to address when performing in a turbulent business environment.

7.2.2 AOHRs as an Integral Part of Business Strategy

As new insights arose from the data, and the criticality of aligning the HR strategy with the business strategy and other critical contextual aspects became apparent, the close ties between HR strategy -business strategy, organisational agility capabilities-workforce agility capabilities, and business agility providers-HR agility providers became more and more evident. Especially, when performing in business environments characterised by hyper-competition, uncertainty, and continuous change, the importance of these alignments became more evident. Thus, it was decided to reshape the framework in a way that better reflects the interdependencies of HR and business strategies and their linkage with external and internal environments. From this perspective, AOHRs and its components are presented as a child of (an integral part of) business strategy in the updated model.

7.2.3 Strategic Agility Postures

As discussed in chapters 5 and 6, the study identified the existence of different types of agility strategies across the participating organisations, as well as within a firm at different points of time, both which resulted in variations in the adoption of HR practices. From a theoretical point of view, in the discussion chapter this finding is related to the agility

strategy framework proposed by Sharifi (2014), arguing that a strategic response to contextual situations can include one or a combination of a range of agility postures including reactive, responsive, and proactive. Consequently, it was decided to place Sharifi's (2014) agility framework (which is a revised version of Zhang and Sharifi's agility model (2000)) as the theoretical basis of the research framework.

Correspondingly, the model argues that an organisation's decision in relation to the adoption of an appropriate bundle of AOHR practices is dependent on the firm's strategic agility postures where different organisational and workforce capabilities are required that have to be created by different combinations of HR practices. Accordingly, agile HR strategy is a highly contextualised system of decisions as HR strategic choices can take different forms according to different agility postures in response to the various degrees and nature of internal and external contingencies.

7.2.4 From Workforce Agility Capabilities to HR Agility Capabilities:

As the study progressed, it became apparent that HR, in order to effectively reconfigure and augment an organisation's human resources, not only needs to build an agile workforce, but also need to bring agility to HRM of the firm and the HR function itself. Thus, HR agility capabilities are regarded as the focal element of the framework, which encompasses both workforce agility capabilities and HR function agility capabilities.

HR function agility is the ability of the HR function to build, renew, integrate and reconfigure human resources (headcount and their alignments), workforce competencies (skills, knowledge, mindset and behaviours), HRM system components (principles, practices and processes), and HR functional competencies to address the increasingly changing business environment. Thus, HR function agility capabilities as a new dimension is added to the framework and is defined as the capability of HR function in devising an appropriate, and speedy response to the changing strategic needs of the business. These capabilities are both process and competency-based, thus, classified into two groups:

- **HR Process-based Capabilities:** which are routines and process-based capabilities of the HR function by which HR achieve new human resource configurations in response to the HR agility drivers, market changes and business contingencies.
- **HR teams' agility competencies,** which are HR teams' necessary competencies that give them the ability to perform the key HR roles in relation to agility, including

altering HR routines, practices, and human resource configurations. A comprehensive discussion of the required competencies of HR teams are provided in section 6.2.4.1.

Figure 7.3 exhibits how the focal point of the framework has changed from workforce agility capabilities to HR agility capabilities, in addition to showing their main components.

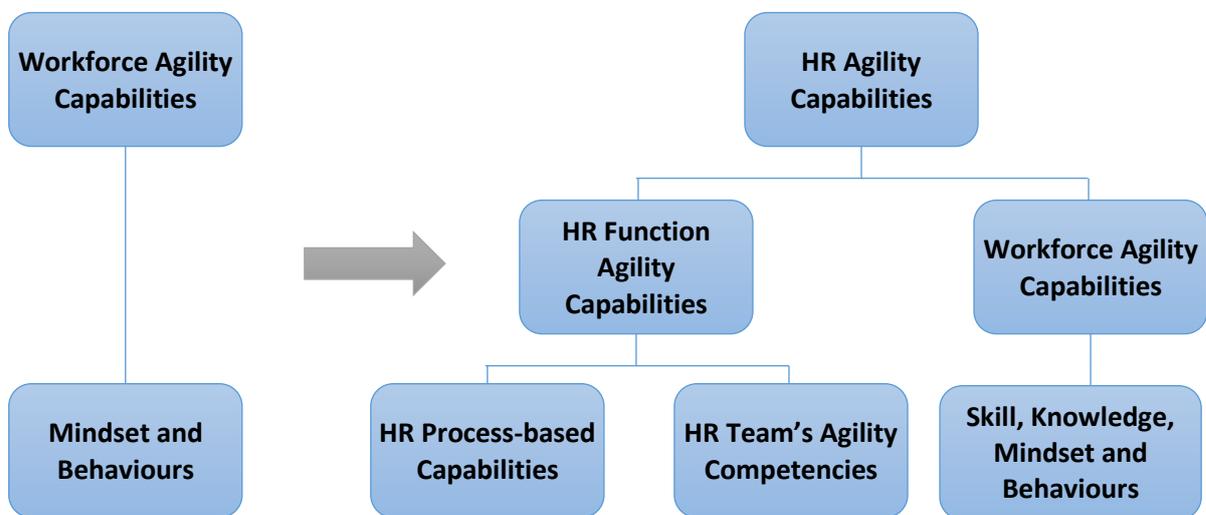


Figure 7.3: Modification of the framework from workforce agility capabilities to HR agility capabilities

7.2.5 HR Agility Providers

The preliminary model considered HR agility providers as the means by which the required workforce agility capabilities could be achieved. The updated model, also regards HR agility providers as a key component of the framework, by which the required ‘HR agility capabilities’ can be achieved. While the original ‘HR agility providers’ just include HR initiatives and practices, in the revised model, it incorporates two main categories including agility-oriented organisational infrastructures, and agility-oriented HR system, which comprises AOHR principles, policies and practices as well as the components of an agile HR function.

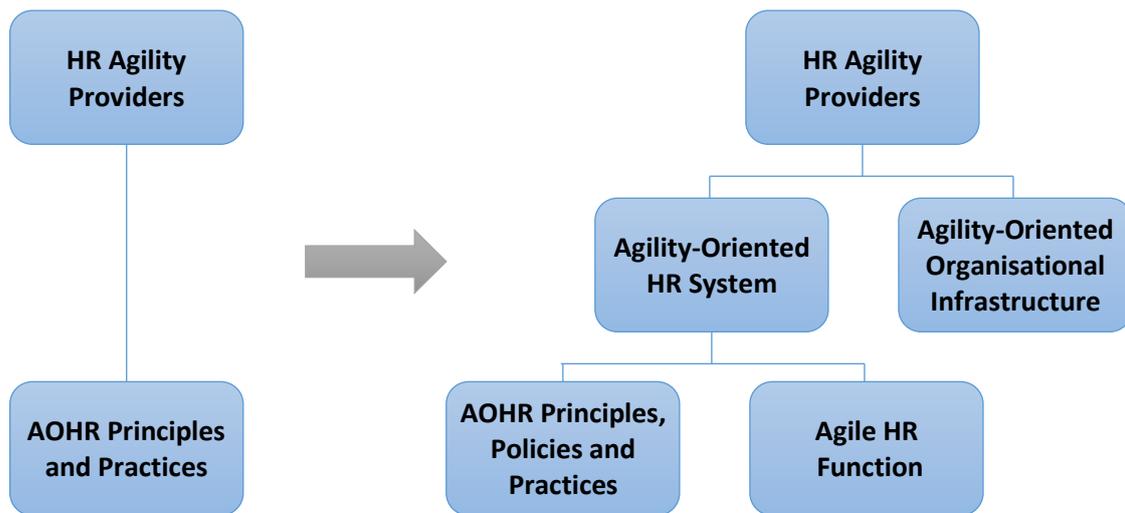


Figure 7.4: The changes in the components of ‘HR agility providers’

While in the original model, the relationships between the components of the framework were not sufficiently clear, these relationships and interdependencies are identified and administrated in the design of the revised framework, which will be discussed in the next section.

7.3 An Updated Conceptualisation of SHRM for Achieving Strategic Agility

This section, first provides a definition of SHRM suitable for the uncertain business environment. Then, the updated conceptual framework for AOHRs will be presented, by introducing its three main components. Thereafter, the theoretical approach underpinning the framework will be introduced followed by an introduction of the content and the process aspects of the proposed HR strategy.

7.3.1 Agility-Oriented SHRM: Definition

It is argued that agility as a strategic approach provides a transient and temporary response to the fluid and increasingly changing environmental conditions through a continual process of choosing, changing and adjusting the firm’s direction (Sharifi, 2014). The continual and rapid reconfiguration of business strategy and organisational arrangements requires a rich and varied source of internal capabilities to recompose/redesign business systems easily, and to redeploy resources quickly (Doz and Kosonen, 2008) in order to respond to a spectrum of market and strategic conditions.

The research findings implicate that HR can be a source of strategic advantages for the firm, by embracing the principles of agility in HR strategy making and implementation as well as the components of its HR system. This involves establishing HR systems, processes and people management approaches that make the reconfiguration and transformation of business strategies, business models and systems easier and quicker. In this way, HR can develop an extensive and varied source of dynamic capabilities for producing the necessary human assets and competencies.

Embracing agility by SHRM also implies providing transient responses to accommodate momentary strategic objectives. This includes an ongoing reinterpretation of contextual information, a reassessment of the necessary organisational and workforce capabilities, and a re-evaluation of adopted philosophies, and processes, policies and practices-in-use to reflect immediate strategic directions and situations. In other words, HR strategy should not only accommodate the requirements of the umbrella strategy (i.e. strategic agility, flexibility, and responsiveness of the firm), but should also facilitate the implementation of the transitory strategic directions.

Accordingly, HR while it needs to build an agility-oriented set of workforce attributes to provide a foundational HR capabilities for agility, it also needs to repeatedly assess its strategic choices (HR system and its components: HR practices and principles, workforce capabilities, talent pool and combinations of skills and competencies) in light of transient strategic directions. It also needs to evaluate whether the existing strengths (workforce capabilities/arrangements/ principles and practices) can accommodate the requirements of the immediate strategic situations. Thus, HR should frequently search for different people management routines, implement unconventional changes in the HRM system in response to the unprecedented challenges, and ensure that the various combinations and configurations of human capital can be achieved to take advantage of emerging situations or to overcome arising threats.

HR strategy is defined by Cascio and Boudreau (2012:1) as “the decisions, processes, and choices that organisations make about managing people”. When agility is the strategic management approach of an organisation, the ‘HR strategic choices’ are about identifying how to effectively build and utilise its human capital to facilitate the quick implementation

of transient strategies, and to contribute to the development of organisational agility capabilities such as strategic sensitivity, leadership unity and resource fluidity.

In light of the findings, this research defines an Agility-Oriented HR Strategy as: “a stream of decisions about human resources which provide a proactive, quick, and ongoing alignment of the HRM system (philosophies, policies, practices, structure and processes) with continually changing business strategies and an increasingly changing environment through a continual evaluation of contextual information, assessment of the HR strengths (including workforce capabilities, HR function capabilities, and HR system strengths) and through frequent and rapid reconfigurations of human resources and their competencies (both individual and collective), and relevant HRM principles and practices.

The frequent and rapid reconfiguration of human resources requires an extensive, varied and dynamic source of workforce capabilities as well as HR function capabilities to allow easy and fast deployments of the workforce across the organisation. To summarise, an agile HR strategy should provide HR function with a series of agility capabilities to quickly reconfigure human resources and to proactively adapt and modify its structure, administrative systems, principles and practices, and the competencies portfolio of the workforce in response to both transient and non-transient organisational and environmental changes. Such an HR strategy has the capacity to facilitate the organisational agility.

An agile HRM's main strategic roles include being a strategic business partner and designing a highly dynamic and supportive HR system, developing 'workforce agility capabilities', reinforcing an agile culture and fostering agile mindsets and behaviours, creating an environment which facilitates agility development and creating an agile HR function.

7.3.2 Agility-Oriented SHRM: The Underlying Assumptions

Several assumptions underpin this conceptualisation of AOSHRM:

First, agility, as a strategic approach, provides a transient and temporary response to the fluid and increasingly changing environmental condition through the continual process of choosing, changing and adjusting the firm's direction (Sharifi, 2014). An Agility-Oriented HR Strategy provides a proactive, quick, and ongoing alignment of workforce capabilities

and HRM systems (philosophies, policies, practices, structure and processes) with continually changing business strategies, through an ongoing reinterpretation of contextual information, a reassessment of the necessary organisational and workforce capabilities, and a re-evaluation of the HR system components so as to achieve the required dynamic alignment.

Secondly, strategic agility may require an incompatible combination of strategic postures, or a cyclical move between different postures, from reactive to responsive and to proactive. HR strategic responses to contextual situations which result from these various strategic postures, can be multiple, equally effective configurations of workforce agility capabilities and combinations or bundles of AOHR practices, that are appropriate for different strategic postures.

Thirdly, strategic agility, and HR strategy as its component, should be considered to possess a contingency nature. Consequently, an AOHR system should be regarded as a highly contextualised, dynamic, and “open” system, following the open system perspective in organisation theory (Katz and Kahn, 1966; Thompson, 1967), which co-evolves along with business strategies and takes different forms according to the different agility postures in response to the various degrees and natures of internal and external contingencies.

Fourthly, similar to the framework of SHRM for organisational resilience proposed by Lengnick-Hall et al. (2011), this framework adopts a configurational approach to SHRM (Delery and Doty, 1996), differing from best-practices and traditional contingency theories by following the three criteria of (1) being guided by the holistic principle of inquiry, (2) being based on typologies of ideal types, and (3) adopting the assumption of equifinality (i.e., multiple unique configurations of factors can result in maximal performance). (Delery and Doty, 1996; Lengnick-Hall et al., 2011).

Thus, the aim of the framework is to develop an AOHR system that achieves both a horizontal and vertical fit, by adopting internally consistent bundles of HR practices that lead to the creation of desired agility capabilities, and also by aligning the components of the HR system with alternative strategic configurations to achieve a vertical fit. Moreover, to incorporate the assumption of equifinality, while the research introduces a series of HR practices as potentially appropriate for agility development, it acknowledges that there are multiple combinations of HR practices that can potentially be bundled in line with the

identified HR roles and AOHR principles to create agility capabilities. The issues of horizontal and vertical fit are discussed in more detail in the following part.

7.3.2.1 Vertical Alignment: HR Strategy-Business Strategy Two-Way Fits

Expanding on the contingency perspective, this framework suggests that the HR strategy of a firm needs to be tailored to align with business strategy and other critical contextual aspects. Thus, the formulation of an agility-oriented HR strategy should focus on aligning its HRM system with the firm's business strategies which are subject to continual and rapid reconfigurations in response to various external environment conditions (external fit) including economic, political, legal, social-cultural, technological and institutional drivers as well as unionization and labour market conditions, and industry characteristics (Jackson and Schuler, 1995). In line with the idea of external fit, the framework explicitly highlights the criticality of consideration and constant assessment of external environment forces in the formulation of HR strategy and the frequent renewal of HR systems. This include both business and HR agility drivers which directly and indirectly affect the management of people in an organisation.

As the response to the contextual situations can take one or a combination of strategic postures ranging from reactive and responsive, to a proactive and transformative response (by manipulating the situation and creating change), HR strategy in turn can take a reactive or proactive perspective to the concept of fit. Adopting a reactive fit posture, HR strategy is derived entirely from the business strategy and environmental conditions, and the HR system is supposed to respond by implementing the given strategy (Wright and Snell, 1998). While, employing a proactive perspective, considers a two-way alignment and the interaction between HR and business strategies.

By adopting this, the framework perceives a very critical role for HR function in the strategic formulation of the business, especially when the firm adopts a proactive form of agility and aims to create change in its marketplace. Thus, when an organisation aims to enact its environment, it is vitally important to fit the business strategy with the actual, instead of the desired workforce capabilities (skills, knowledge, and institutionalised behaviours) and the familiar and rehearsed HR capabilities. This corresponds with the Lengnick-Hall and Lengnick-Hall (1988) argument which proposes a reciprocal interdependence between strategy and HR and suggests that human resources should be

considered in both strategy formulation as well as strategy implementation.

In addition, in line with the general fit and alignment theories (e.g. Jackson and Schuler, 1995), internal alignment and adopting a highly adaptable organisational infrastructure are expected to be part of the consideration within the organisation and HR function to make HR strategy aligned with other functions and internal organisational environments.

7.3.2.2 Vertical alignment: Strategy- workforce attributes fit and Strategy- HR systems fit

Regarding the alignment of human resources with a firm's business strategy, Dyer and Ericksen (2006), focused on the alignment of 'workforce scalability' elements instead of the components of the HR system. This research, however, suggests paying attention to two types of alignments: strategy- workforce attributes and strategy- HR systems. This is in line with the assumptions advocated by scholars such as Schuler and Jackson (1987a) who argued that different business strategies and contexts demand different sets of employee skills and behaviours. Consequently, various types of HR systems (i.e. HR philosophies, policies and practices) are required to generate different sets of employee skills and behaviours.

Moreover, the workforce agility capabilities-strategy fit can act as an integration pivot between vertical and horizontal alignment in AOSHRM and support agility strategy. This is consistent with the view of Werbel and DeMarie (2005) who assert that person-environment fit is a linking pin between vertical and horizontal alignment in SHRM. Considering that agility strategies are usually multi-dimensional and subject to significant differences across firms and industries, HR strategy should give effect to the firm's unique agility strategy objectives, and focus on building the necessary skills and developing behaviours that are needed for the desired organisational agility capabilities.

It is important to note that performing under persistent uncertainty and continuously morphing conditions, the obtained fits are not sustainable. Thus, an ongoing reinterpretation of contextual information, a reassessment of the necessary organisational and workforce capabilities, and a re-evaluation of policies and practices-in-use is required to achieve a dynamic fit. Accordingly, HR strategy needs to constantly realign itself with different competitive scenarios, to adapt to changing strategic requirements of the business and employees, and to address both the current and future competency needs of the business.

To obtain this, HR needs to select and employ HR system components which bring flexibility, fluidity and quickness to HR processes and functions in order to facilitate the above unending stream of interpretation, assessment, evaluation, reconfigurations and redeployments.

7.3.3 The Updated Conceptual Model for Agility-Oriented SHRM

The updated model is a synthesizing framework built on the framework of strategic agility presented by Sharifi (2014), also incorporating the previous theories and frameworks of agile SHRM (Shafer et al., 2001; Dyer and Shafer, 1999, 2003; Dyer and Ericksen, 2006), while trying to address their shortcomings by the insight obtained from the empirical investigations. The framework

- 1- Explains how dynamic business and HR context (HR agility drivers) shall be continually evaluated and interpreted into HR strategic choices and actions, addressing both reactive and proactive approaches to HR strategy making.
- 2- Explains how strategic agility, transient strategies and HR systems and capabilities can be harmonised and employed in driving organisations in uncertain and turbulent environments
- 3- Addresses both process and content aspects of AOSHRM
 - 3-1- Process: by explaining the process of analysis of HR (workforce and function) strengths and weaknesses in strategy formulation and implementation, the reciprocal interdependence between HR strategy and business strategy, and the 4-Steps model for the formulation of an AOHR strategy
 - 3-2- Content: by indicating the principle roles of an agility-oriented strategic HRM and identifying the main constructs of an AOHR strategy

Figure 7.2 shows the proposed conceptual model for crafting and implementing an AOHR strategy. It comprises three main constructs including HR agility drivers, HR capabilities and HR agility providers. "HR agility drivers" are the changes and pressures from the external and internal business environment that lead an organisation to craft an agile HR strategy which support ongoing alignment of the HRM system with continually changing business environment and strategies through frequent and rapid reconfigurations of human resources and their competencies.

"HR capabilities" are the essential capabilities of workforce and HR function that the

organisations need in order to quickly reconfigure human resources and their competencies portfolio to positively respond to and proactively take advantage of the changes. “HR agility providers” are the means by which the required workforce and HR function capabilities could be achieved. The following section introduces these constructs in more detail.

A “Process Model” has been developed to assist organisations in formulating AOHR strategy based on the conceptual model described above. The Conceptual Model in Figure 7.2 and the Process Model in Figure 7.5 need to be viewed in combination to better understand how the conceptual model operates.

The Process Model (the 4-Steps model) is depicted in Figure 7.5 and explained in detail in section 7.3.3.3.1. It consists of four major steps: the analysis of an organisation’s agility drivers; the identification of necessary organisational capabilities; the identification of necessary HR capabilities; and the determination of the HR agility providers which could develop the identified HR capabilities.

7.3.3.1 The Components of the Model (Elements of The Orange Boxes in The Model)

1) HR Agility Drivers

HR agility drivers are contextual factors representing the characteristics of the external and internal business environment as well as the HR environment which directly influence the HR choices for strategic action and consequently determine the level of agility needed in HR function and system. These drivers while including the overall agility drivers of the business, comprise some HR-specific factors such as the accelerated changing needs of the workforce, expectation of a higher degree of responsibility and autonomy, career development, mobility and employability opportunities, the demand for faster promotions, and flexible working time and place, intense competition for talent, the emergence of new ways of working such as 24/7, borderless and constantly in flux work model, the technological changes which directly influence the way, where and when employees live and work.

2) HR Agility Capabilities

The HR agility capabilities are classified into two main groups: workforce agility capabilities and HR function agility capabilities.

Workforce agility capabilities are the required combinations of skills, knowledge, mindset and behaviours of a workforce that provide an agile, fluid and flexible resource base that can be reassembled, mobilised, and redeployed to accommodate the altering objectives of the business.

The previous works of agile SHRM (Shafer et al., 2001; Dyer and Shafer, 1999, 2003; Dyer and Ericksen, 2006) emphasised extensively the importance of agility-oriented capabilities and in particular, the necessary mindset and behaviours in the conceptualisation of an agility-oriented SHRM. Thus, the identification and development of necessary workforce agility capabilities is the primary task of HRM in the updated framework too. This, however, is extended to address the dynamics of organisational agility and workforce agility capabilities. So, the process of developing necessary workforce attributes includes the exploitation of existing workforce capabilities (skills, knowledge, mindset and behaviours) as well as developing new ones, and also a continual renewal of the competence mix in response to the various strategic needs. In other words, the HR role is to develop two groups of workforce capabilities: foundational agility capabilities, and transient (strategy-related) capabilities.

HR function agility capabilities, are the capabilities of HR function in devising appropriate, and speedy responses to the changing strategic needs of the business. These capabilities are identified and classified into two groups:

- *HR Process-Based Capabilities*: which are routines and process-based capabilities of HR function by which HR achieve new human resource configurations in response to the HR agility drivers, market changes and business contingencies
- *HR teams' agility competencies*, which are HR teams' necessary competencies that give them the ability to perform the key HR roles in relation to agility, including altering HR routines, practices, and human resource configurations. A comprehensive list of the required competencies of HR teams for agility is presented in chapter 6.

In summary, HR function agility capabilities include some contextual elements that enable the HR function to accurately decide the most appropriate type of strategic choices to pursue, given the organisation's altering strategic situation. These involve creating a diverse repertoire of routines and human capital which enable the HR function to respond to an array of different strategic directions which the firm chooses in response to environmental shifts and competitive conditions. All dimensions of HR agility capabilities- (HR function agility and workforce agility)- should act interactively to assist with the development of different organisational capabilities for agility.

3) HR Agility providers

HR Agility providers refer to the means by which the required workforce and HR function capabilities could be achieved. These providers are identified and classified into two main categories: agility-oriented HR system and agility-oriented organisational infrastructures.

An Agility-Oriented HR system comprises appropriately designed elements including AOHRM principles, policies, practices and processes- that an organisation adopts to develop necessary capabilities and to manage the configuration of different dimensions of HR such as headcount, work design and deployment patterns, and employee involvement and contributions. These elements are collectively aimed at providing the firm with the specific organisational capabilities to proactively respond to unpredictable change and to exploit and manage uncertainties. This implies that the elements of an AOHR system are not a random collection of factors, but are horizontally aligned as a reciprocally reinforcing set of people management approaches and practices to produce HR dynamic capabilities.

While, the empirical study mainly focused on identifying AOHRM practices, the framework suggests that considerable attention should be given to the overarching HRM philosophies in order to appropriately align them with the desired agility culture, as HRM philosophies should significantly reflect the values and beliefs underpinning a firm's leadership and people management approaches.

The framework also highlights the importance of an agile function as an HR agility provider. HR, in order to accommodate the conditions required to develop and maintain agility, also needs to invest in bringing agility into its own internal function and HR teams.

This involves in particular, an internal focus on HR structure, competencies, processes and technologies. Thus, the HR providers also include an agile HR function, which requires a formal HR retraining/re-skilling and a continuous education of HR teams, the identification and adoption of new structures, tools, technologies, software systems and solutions which facilitate fast, data-driven and predictive decision-making and implementation for HR leaders.

HR agility providers, in addition to a supportive HR system, include an agility-oriented infrastructure which enables the firm to scan the change, accelerate decision making and effectively respond to change in a timely manner. It is because, to be able to realign and adapt quickly, it is assumed that political systems, decision making mechanisms and the level of bureaucracy in the organisation is not hindering a quick adaptation of HR policies and practices. So, the existence of an agility-oriented organisational infrastructure encompassing a fluid structure, agile information and communication system, with a knowledge sharing mechanism, and an adaptable workplace design is essential along with an HR strategy to build a desired workforce and organisational agility capabilities.

In addition to the three main components, the framework also outlines the critical roles that HRM should play, so as to contribute to strategic agility which include

- Being Strategic business partners
- Developing ‘workforce agility capabilities’
- Fostering Agile Culture
- Creating Environment Which Facilitates Agility Development
- Creating an Agile HR Function

7.3.3.2 Explanations of the Schematic Framework:

The idea behind having inner circles and boxes inside the outer one comes from the notion of reciprocal interdependency and an external (vertical) fit between an organisation's business strategy and its HR strategy. So, the diagram portrays HR strategy as a component of business strategy (The business strategy box in the left column surrounding the HR Strategy box), getting formulated by comprehending the environmental uncertainty and business contingencies and all opportunities and threats that coming from them.

The arrow from top left circles to the strategy boxes, and also the idea of surrounding the HR agility drivers by business agility drivers emphasise the influence of external environmental and internal organisational pressures in the formulation of business and HR strategy, which in turn impact upon the selection and modification of the HRM system and its components.

At the top left part of the model, it is shown how environmental contingencies and forces inform strategic choices. Thus, the process of strategy (both business and HR strategy) formulation starts with an examination of environmental contingencies and forces what we call agility drivers. The strategy formulation process also involves input from internal contingencies including feedback from the evaluation of current HR systems. These are better explained and shown in Figure 7.5.

At the very centre of the framework are organisational and HR agility capabilities. The HR agility capabilities are located as the focal point of the framework consistent with the Dyer and Shafer models of agile HRM, which consider 'agile people attributes' as key defining factors in crafting an HR strategy. Following the same perspective, the process of the identification and development of necessary workforce capabilities for agility begins with delineating the critical traits of agile organisations, then working back through employees' behaviours and competencies to identify relevant agile attributes. (Also see figure 7.5)

After identifying the desired behaviours, taking a configurational approach, the framework argues that a particular set of HR principles, policies and practices, as matched to the desired strategic outcomes (considering various strategic agility postures), should be selected and it should be ensured that those desired behaviours take place. This is the idea underpinning the agile HRM system column on the right. It is also important to select an aligned and integrated set of HR practices which are collectively aimed at fostering the necessary mindset and behaviours and reciprocally augmenting each other.

Additionally, the framework argues for the need for a frequent review of necessary individual and organisation-wide skills portfolios, behaviours and capabilities profiles and consequently the required set of HR practices. It is because, agility drivers change continuously. So, the fit between HR practices and strategy will change through different stages of an organisation's life cycle.

This in turn demands a highly dynamic and flexible HR system which can analyse capability needs continuously and have appropriate infrastructures, policies and practices in place to easily and quickly reconfigure human assets so as to adapt quickly and effectively to the changing environment. The components of such an HR system are outlined in the right column named as the ‘agile HRM system’, which includes agility-focused HR policies and practices, in addition to an agile HR function including agile HR teams, processes and technologies, which are supported by an agility-oriented organisational infrastructure.

7.3.3.3 The Formulation Process of AOHRM Strategy Making

HR strategy, and the contents of an organisation’s HRM, are forming and transforming in a fluid and dynamic space between the outer environmental context (social, economic, technological, political, legal and competitive) and the inner organisational context (culture, structure, leadership, technology and business processes and outputs) (Budhwar and Debrah, 2001). Hyper-competition and high-velocity environments with continuously morphing conditions make the anticipation of changes in these contextual factors far more challenging due to the inherent instability and uncertainty of the situation (Lengnick-Hall and Beck, 2005).

This framework argues that the characteristics of turbulent environments and transitory conditions while requiring proactive HRM planning to maintain long-term flexibility and the responsiveness of HR systems, it also calls for a degree of emergence approach to SHRM formulation to fulfil the altering of short-term goals. Thus, consistent with the views of Brown and Eisenhardt (1998), the framework suggests SHRM formulation to take a middle ground between detailed planning and mere emergence (Shafer et al., 2001). Consequently, HR strategy can take a progressive evolutionary nature, instead of classical systematic planning, following a cyclical 4 steps as depicted bellow:

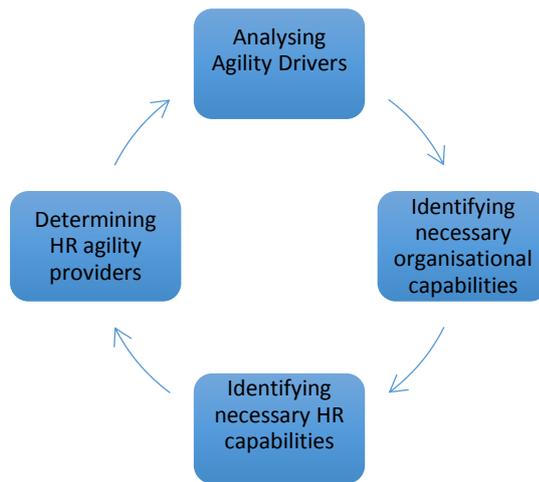


Figure 7-5 Process model for AOHR strategy formulation

7.3.3.3.1 Process Model for AOHR Strategy Formulation

The research proposes the formulation of an AOHR strategy that follows the 4-Steps as below:

- 1- Sensing and analysing of the signals and information from agility drivers (both business and HR agility drivers)
- 2- Identifying the foundational and context-specific organisational capabilities which are necessary for the facilitation of the determined responses to change
- 3- Assessment of existing HR capabilities (both workforce capabilities and HR function capabilities) in light of the required organisational capabilities and identifying the necessary HR capabilities.

This includes identification of the required headcount and necessary individual competencies (skills, knowledge, attitudes and behaviours) and their competence mix as well as the required capabilities of HR function (process and competency-based capabilities)

- 4- Closing the gap between current and desired agility capabilities in workforce and HR function by the aid of HR agility providers. This includes the determination of the HR system components (principles, policies and practices) which can create the required workforce capabilities and facilitate the development of organisational capabilities for agility.

Extending on the Ability–Motivation–Opportunity (AMO) model (Blumberg and Pringle, 1982; Gutteridge, 1983), and the 4-Tasks Model (Jackson and Schuler, 2002; Jackson et

al., 2003; Schuler et al., 2001) the fundamental tasks of an HR function here is to ensure that employees have the skills, knowledge, motivation, and learning and developmental opportunities to manifest the required agile behaviours. Another important task of HR is to rigorously monitor and evaluate the impact of the deployed/implemented HR practices and all developmental activities and to initiate corrective adjustments going through a cyclical process as depicted in Figure 7.5.

The criticality of HR speed in decision making, the formulation, and implementation of SHRM and also all the necessary reconfigurations and renewal in different HR aspects, highlights the importance of access to a centralised workforce data. It provides a real-time, accurate and detailed knowledge of workforce skills, knowledge and capabilities in order to make quick and informed decisions in relation to HR configurations and transit quickly and easily from one human resources configuration to another (Shill et al., 2012; Beatty, 2005). In addition, the role of just-in-time learning and rapid re-skilling is becoming vitally important.

It is equally important to ensure that HR investments and the bundle of developed and deployed HR practices are horizontally aligned to collectively enable the firm to achieve its strategic priorities and to meet the key requirements of external stakeholders (e.g. customers, investors). For instance, when speed and ease of human resource re-configuration (workforce alignment and fluidity) is desired, HR needs to continuously renew the capability repertoires of the workforce. Accordingly, every component of the HR system should embed the notion of continuous renewal and constant review.

The capability management should continuously monitor the workforce capabilities repertoires and as Beatty (2005:9) asserts, ensure that the “workforce is sustainable for tomorrow, next year and even the next decade rather than building up reserves”. Training and development practices should focus on continuous training and re-skilling.

Performance management should provide real-time and continuous feedback to employees rather than traditional annual or six months’ review feedback. Employee Communication practices should frequently communicate business information (both positive and negative), common performance metric, shared values, and information from customers and alliance partners to provide a real-life picture of the situation to employees.

Work design and staffing practices should promote worker exchange programs across the organisation to support internal mobility – movement across jobs, projects, careers, functions, geographical locations and business units – by employing practices such as flexible assignments, job rotation and secondment, and also by designing incentives and redesigning career paths, as well as by participating in crowdsourcing events (Accenture, 2013) to facilitate the assignment of employees when and where business demands. Recruitment and talent acquisition practices, in consistent with the principles of agile supply chains management, should engage with universities, training institutions or agencies to pre-qualify/identify talents and to ensure that a swift acquisition of talent is possible when business demands.

Finally, the implementation of the proposed AOHR model is not an easily accomplished undertaking. It requires a fundamental change in the management and leadership approach. Thus, the success of this large-scale organisational change comes from committed HR professionals and business leaders who work collaboratively and a carefully planned and managed implementation. Accordingly, the management and leadership approach should support the above principles by practising openness, trust, self-leadership, autonomy and empowerment. This is just an example of HR practices' horizontal alignment to achieve a single goal which is the fast and ease alignment and fluidity of human resources.

7.3.4. How the Model Can Be Operationalised in Different Contexts

The presented conceptual model in combination with the 4-Steps model for the formulation of an AOHR strategy (presented in figure 7.5) address both *process* and *content* aspects of AOHR. The process part explains the process of analysis of HR strengths and weaknesses in strategy formulation and implementation, the reciprocal interdependence between HR strategy and business strategy, and the 4-Steps model for the formulation of an AOHR strategy. The content part, indicates the principle roles of an AOSHRM and identifies the main constructs of an AOHR strategy. In this section, the issue of generalisability is discussed against these two aspects.

Although generalisability and representation was not the main aim behind this investigation, it was attempted to include a cross section of organisations to extend the range of industries studied, as well as including both private and public sectors in uncovering the complex phenomenon of AOHR. The conceptual model for AOHR

strategy is developed after identifying the main constructs and elements constituting an AOHR strategy and the relationship between these factors based on the insight obtained from the 17 participating organisations.

7.3.4.1. Content and Generalisability

Considering that a large number of contextual factors influence the content of an organisation's HRM strategy, with regard to the content aspect of the AOHRs, only higher-level constructs and elements introduced in the model are generalisable in different contexts as manifested in the 17 organisations. In other words, any organisations aiming to craft an AOHRs, need to identify and analyse their *agility drivers* (both business and HR agility drivers), identify their *HR capabilities* (both workforce capabilities and HR function capabilities) in light of the required context-specific organisational capabilities, and determine *HR agility providers* including the HR system components (principles, policies and practices) which can create the required HR capabilities.

While these elements explicitly or implicitly considered in all AOHR strategy making, the content of these constructs are largely context-specific and cannot be generalised across different firms. For instance, while the issue of building workforce agility capabilities was the focal point of all AOHRs, different workforce agility capabilities outlined in Table 4.4 were not equally important across different firms. Therefore, each organisation should identify and develop their unique workforce agility capabilities in response to the distinctive agility drivers they are facing, and to the specific sets of organisational agility capabilities they pursue, correlating to their unique circumstances, goals and business objectives.

Similarly, while adoption of AOHRM practices (a component of HR Agility providers) is necessary to achieve the required HR capabilities, it does not imply that AOHR strategy is reliant on a set of 'best' practices. Although many of the identified AOHRM practices in Table 6.4 are commonly perceived by the participants as effective in promoting agile attributes and creating organisational agility, they should not be considered as a prescriptive list of HR best practices to apply to all organisations. Considering the criticality of business strategy-HR practices alignment (see section 6.2.5.2., fourth factor), organisations should assess, select, and align appropriate HR practices matching with their unique business and HR strategies and desired agile people attributes.

Overall, as explained in section 7.2.3, agile HR strategy is a highly contextualised system of decisions as HR strategic choices can take different forms according to different agility postures in response to the various degrees and nature of internal and external contingencies (various agility drivers). Thus, these strategic choices (HR system and its components: HR practices and principles, workforce capabilities, talent pool and combinations of skills and competencies) are not generalisable across different firms.

7.3.4.2. Process and Generalisability

The conceptual model in combination with the 4-Steps model for the formulation of an AOHR strategy (figure 7.5) provides guidance on the process of formulating an AOHR, through clarifying a line of sight from drivers of agility back through a set of context-specific organisational agility capabilities to a set of necessary HR capabilities and finally relating them to a set of HR agility providers. The proposed 4-steps model of AOHR formulation and the corresponding insights provided on the contents of the AOHR can be used to undertake the initial planning of the HR strategy and system, and to specify their desired organisational culture and employees' mindset and behaviours, while ensuring that plenty of room is left for experimentation and the evolution of the HR strategy.

As explained in chapter 6, section 6.3, the participating organisations' approach to AOHR strategy formulation was a more emergent approach in which HR strategies and its components developed to a large extent in an emergent and evolutionary way over time, while some degree of planning was involved along with the deliberate pursuit of strategic agility at organisational level.

Thus, to explain how the process aspects of the conceptual model and the 4-Steps model operated in the context of participating organisations, none of the participating organisations have explicitly developed a specific HR strategy named as agile HR strategy prior to the implementation of their agility programme. Instead, they have incrementally made significant changes in the purpose, focus and structure of their HRM in order to support fostering agility and innovation. As part of these HR transformations, agile HR strategy and its components, particularly agility-oriented HR practices, have emerged over time along with the organisational journey towards agility.

The strategy formulation process proposed in the 4-Steps model follows the sequence of these incremental changes that happened in the HRM across the participating organisations. An example of this provided in section 6.3 at final paragraph. While the conceptual model for AOHR strategy and the 4-Steps model have not been empirically validated in this research, the process aspects can be generalisable across different firms ensuring that plenty of room is left for experimentation and the evolution of the HR strategy. This is consistent with the views of Brown & Eisenhardt (1998: cited in Shafer et al 2001)) who recommend unpredictable environments demand a middle ground between detailed planning and unbridled emergence.

7.4 Summary of the Chapter

This chapter presented the research conceptual framework for AOHR strategy and the definition of the concept in addition to the assumptions underpinning the presented conceptualisation of AOSHRM.

1. A quick review of the preliminary model and its underlying assumptions is provided
2. The main modifications to the initial model are described through a component by component comparison of the preliminary and updated model.
3. A definition of AOSHRM suitable for an uncertain business environment is provided followed by the presentation of the underlying assumptions underpinning the definition and the updated conceptual framework
4. The updated conceptual framework for AOHRs is presented, by introducing its three main components and the explanations of the schematic framework.
5. A cyclical 4-steps process model for AOHR strategy formulation is proposed explaining the necessary steps for formation and formulation of AOHR strategy.

CHAPTER EIGHT

CONCLUSION

8.1 Introduction

This is the final chapter of the thesis in which the major achievements and contributions of the research will be discussed. The discussion starts with a restatement of the research aims and objectives and how these were addressed and achieved. Then a brief discussion of the contributions of the research to the body of knowledge is provided. It delineates the contribution this research makes to the field of strategic management, organisational agility and SHRM generally and to HR agility specifically. It is then followed by discussing the strengths of the research, and then the inherent limitations of the study. Afterwards, the chapter discusses the practical implications of the study providing recommendations to HR directors and business managers. By the end of the chapter, some suggestions for future research are presented.

8.2 Research Aims, Objectives and Achievements

Since its origination in the early 1990s, “agility” has received an increasing attention in literature. The interest in adopting agility as a strategic management approach within organisations, has extended into the range of business sectors and a wide range of disciplines, resulting in different organisational functions becoming more concerned with their contribution to the overall agility of the firm. Although, agility literature indicated that achieving agility is heavily dependent upon various human factors such as people attributes, management approach and the prevailing culture of an organisation, how this contribution can happen through HR function remains very unclear.

This was an initial motive for a further exploration of the subject. Further reviews of the previous studies indicated that little is known about human resource management strategies and systems enabling organisational agility. There were many unanswered questions about the subject such as; how agility could be defined or conceptualised at individual level; how the concept can be infused within the SHRM theories and practices; how HR function can contribute to developing agility; and how agility can be approached and adopted by the HR function itself. By far, the most important void in the SHRM and agility literature is a comprehensive theoretical model for an agility-oriented HR strategy.

To attempt to fill these gaps, this research has focused on exploring the people aspects of

organisational agility aiming at: identifying the HRM critical roles in developing organisational agility; and developing a theoretical model for crafting and implementing a HR strategy which assists organisations in acquiring agile attributes. The associated objectives of the study were:

Objective 1: To develop an understanding of the human aspects of organisational agility, and identify the human factors that are critical to the achievement of agility

Objective 2: To explore how HR function can contribute in achieving organisational agility, delineate the key HR roles, and identify the main constructs and features which constitute an HRM supportive for agility and the relationship between these factors.

Objective 3: To contribute to the knowledge of organisational agility and SHRM field by deriving a conceptual framework for Agility-Oriented Human Resource Strategy (AOHRS), which helps organisations in acquiring agile characteristics.

To achieve these aims and objectives, an interdisciplinary approach was adopted. So, the research reviewed and synthesized literature in the areas of strategic and organisational agility, agile manufacturing and supply chain agility, strategic management, SHRM, and organisational dynamic and change. Moreover, an inductive approach was adopted in which qualitative methods were used as the appropriate fit for undertaking the research. Semi-structured interview was used as the main data collection technique, while information from the companies' annual reports and internal documents provided by some of the organisations were also used as sources of data.

The research followed the 'progressive focusing' model (Stake, 1981 and 1995), so that data collection, data analysis and the development of theories were considered as iterative and interrelated processes. This allowed constant interaction between the theory and the data during the course of data collection and analysis processes. In addition, a template analysis (TA) technique was selected and applied for qualitative data analysis (King, 2012) along with the application of the qualitative data analysis software package, QSR-NVivo 10 (Hutchison et al., 2010).

Despite the limitations and restrictions, all the above aims and objectives were satisfactorily achieved. The research provided a richer understanding of the human aspects of organisational agility, which was mainly obtained on the basis of the perceptions as well

as the real experiences of the participants from a range of sectors and industries. Details of the accomplishments of the study are illustrated below:

Objective 1: To develop an understanding of the human aspects of organisational agility, and identify the human factors that are critical to the achievement of agility

The literature while emphasising the importance of agile people in developing agility, and acknowledging the existence of agile people attributes, it does not provide sufficient clarity as to what human factors are the important ones to be focused on when pursuing agility, and what primary human-related capabilities are needed to facilitate the development of organisational agility. The human factors that are critical to the achievement of agility are identified and among them, workforce agility capabilities and supportive organisational culture have a particular importance:

- Workforce agility capabilities: encompassing the mindset and behaviours of individual employees as well as skills, knowledge and behaviours repertoire of workforce
- Supportive organisational culture
- Highly dynamic HRM system with a collection of AOHR principles, policies and practices
- Agility of HR teams
- Agility of HR function
- Leadership agility

The research also identified the importance of an agility-oriented organisational infrastructure including a fluid and flat organisational structure, an adaptable workplace design, agile information technology, communication systems and knowledge sharing processes. In particular, relation to objective 1, the role of organisational culture in achieving agility, and the key characteristics of a supportive organisational culture have been identified. In addition, the primary characteristics and attributes of people which are central to achieving agility, have been also discovered.

Objective 2: To explore how HR function can contribute in achieving organisational agility, to delineate the key HR roles, and to identify the main constructs and features which constitute an HRM supportive for agility and the relationship between these factors.

The critical roles of HR function in achieving organisational agility are delineated and classified into five categories. To avoid repetition, see Table 4.5 in Chapter Four.

Moreover, the main constructs and features constituting the HRM supportive for agility and the relationship between these factors have been identified. These factors and their relationships are considered as the content part of the AOHR strategy which will be discussed in the next section.

Objective 3: To contribute to the knowledge of organisational agility and SHRM field by deriving a conceptual framework for agility-oriented Human Resource Strategy (AOHRS), which helps organisations in acquiring agile characteristics.

The outcomes of the research in relation to this objective, are the main achievements of the study. The preliminary conceptual model of AOHR strategy was used as a guiding tool to identify the main constructs and elements constituting an AOHR strategy and the relationship between these factors. This was obtained through empirical investigations, the results of which led to further examinations of previous works and an identification of some new elements enlarging the scope of AOHR strategy, while supporting the overall structure of the preliminary framework. The second part of objective number two of the research was also achieved in this phase, which was to identify the main constructs and features constituting the HRM supportive for agility and the relationship between these factors.

A definition is concluded and presented for agility-oriented HR strategy by synthesising the major aspects of strategic agility with the core features of HR strategy appropriate for performing in fluid and increasingly changing environmental conditions. The definition, as outlined in chapter 7, provides a basic understanding of the concept, based on that which the modified conceptual model of AOHR strategy proposes. The thesis dedicates a special chapter (chapter seven) to present the updated conceptual framework for AOHRS, its underlining assumptions, and to introduce its main components.

8.3 Contribution to the Knowledge

This research makes a series of important contributions to both the research and theories of agile SHRM and workforce agility which are relatively new fields of knowledge. It has revisited the agility, SHRM, strategic management and organisational dynamic and change literature to see how the existing theories and perspectives conceptualise human aspects of organisational agility and provide insights for HRM in organisations performing in uncertain and turbulent business environments, and to understand how people management principles and practices should be adopted in such circumstances.

The research has reviewed and synthesized a considerably large body of relevant literature and has indicated a number of inadequacies and shortcomings in HRM-agility theories and research as outlined in Chapter 2. (See section 2.10). In response to these shortcomings, this research explicated the need and offers for a framework for agile HR strategy which gives explicit attention to an array of external environment forces including economic, political, social-cultural, technological and institutional drivers.

The framework proposes the need for an ongoing reinterpretation of contextual information, a frequent review of the necessary individual and organisation-wide skills portfolio and capabilities profiles, and a frequent re-evaluation of policies and practices-in-use to reflect the persistent uncertainty and continuously morphing conditions and agility drivers. The framework also offers for a dynamic HR system which can analyse capability needs continuously and have appropriate policies and practices in place to easily and quickly reconfigure human assets.

Thus, this study can be considered as a step towards a theory building in the field of HR agility, by contributing to the subject knowledge in a number of ways:

- 1- An expansive definition for an Agility-Oriented SHRM suitable for an uncertain business environment complemented by a conceptual framework for agility oriented SHRM
- 2- A comprehensive conceptual framework for Agility-Oriented SHRM

The research has reviewed and synthesised a considerably large body of relevant literature, and addressed their shortcomings by the insights obtained from the case data and then combined them all into an integrative conceptual framework. The

framework captures the essence of organisational agility which proposes how HR strategy in organisations performing in uncertain and turbulent business environments should be formulated and implemented. The framework adds to the resource-based view, AMO-behavioural and human capital theory by articulating a highly contextualised and dynamic HRM system with appropriately designed agility-oriented elements -comprising HRM principles, policies, practices and processes. The proposed HRM system is aimed at providing a firm with specific organisational capabilities to proactively respond to unpredictable change and exploit and manage uncertainties.

- 3- Empirical identification of attributes and capabilities of agile workforce (Tables 4.4 and 6.3).

The study provides empirical insights for researchers and practitioners to understand how the pressures of performing in hyper-competitive environments and the attempts to build organisational agility impact on the expectations from the workforce. It provides a clear picture of the capabilities, mindsets and behaviours that the workforce should acquire in dynamic and agile organisations.

- 4- Empirical identification of Agility-Oriented HR Principles which direct the selection and deployment of the firms' AOHR policies, practices, and investments (Table 6.6).
- 5- Empirical identification of a widely-adopted series of Agility-Oriented HR Practices appropriate for agility development (Table 6.4).

This study is one of the first studies which empirically identifies the different HR practices adopted by organisations in the UK when pursuing agility. More specifically, the study examined the relative popularity of different HR practices in various domains of HR, across different organisations in different sectors within various business environments. It identified intra-organisational differences in deployed bundles of agility-oriented HR practices and related this to the existence of different types of agility strategies across the participating organisations.

- 6- Theoretical and practical guidance for the selection/ deployment and implementation of the AOHR practices in different domains of HR
- 7- Empirical identification of characteristics and dimensions of an agile HR function

Previously, HR-agility research has focused overly on the strategy and workforce attributes constructs, paying no attention to the HR function itself. The factors of the agile HR function are identified as critical for HR in facilitating organisational agility. This research addresses an important gap in HR-agility research by developing the first Agility-Oriented SHRM model which incorporates the element of agile HR function. It disputes how HR, at a functional level, should embrace the concept of agility in its structure and operations model and reconfigure the competencies mix of its team members.

The focal point of the proposed model is the development of *HR agility capabilities*. This is the first AOHR strategy model which not only focuses on the *workforce agility capabilities*, but also regards the development of *HR function agility capabilities* as an important step in agility development. *HR function agility capabilities*, is the capability of HR function in devising an appropriate, and speedy response to the changing strategic needs of the business. These capabilities are identified and classified into two groups: *HR process-based Capabilities*, the routines and process-based capabilities of HR function by which HR achieves new human resource configurations in response to the HR agility drivers; and *HR teams' agility competencies*, the HR teams' necessary competencies that give them ability to perform the key identified HR roles in relation to agility.

8.4 Strengths of the Research

Synthesising 'agility', as a multi-dimensional and imprecise phenomenon, with SHRM, which encompasses several important factors and elements, had the associated difficulties of merging two inherently complex concepts. Adopting an inductive exploratory approach allowed the researcher to build a required understanding from the extant literature and to identify areas requiring further research and extension, and to conduct empirical investigations to fill those gaps. The design of the research was also valuable as it allowed for the identification of emerging themes in different aspects of the subject.

Particularly, the use of the semi-structured interview technique, while provided a framework for collecting data, it also allowed the required flexibility for further explorations of the issues that were more pertinent to individual organisations. In addition, the research utilised several sources of data when possible, including focus groups and company data to increase the validity of the findings by obtaining a deeper understanding.

Moreover, the adoption of the “progressive focusing model”, granted considerable flexibility in the processes of data collection, data analysis and the development of theories, as it allowed early recognition of themes, patterns and relationships. This provided the researcher with opportunities for further investigations, enabling the identification of issues more broadly and clearly than other approaches might have done.

As outlined in chapter 3, the research followed a purposive sampling approach, which restricted the choice of participating organisations to those performing in relatively turbulent markets, and those implicitly pursuing an agility strategy. It was also attempted to include a cross section of organisations to include a relatively wide range of industries in the study as well as including both private and public sectors. The challenge of austerity, cost cutting and significant shrinkage has especially forced the public sector to increase their responsiveness and effectiveness which makes it a valuable component of the study.

Thus, the study ended up with having a range of organisations with agile aspirations, with different market characteristics and various business strategies. This, in turn, resulted in having a wide range of agility strategies, and consequently a broad spectrum of AOHR practices, which enhanced the researcher’s understanding of the effect of contingency factors on the nature of AOHR strategies and practices. These issues might have been overlooked if the study had just focused on a single industry or sector.

8.5 Limitations of the Research

Despite the strengths and contributions outlined for this study, there are inevitable limitations which restrain the generalisability of the findings. These limitations are mainly associated with the broadness of the concept under study and the imprecise nature of agility, and time and funding constraints which in turn imposed limitations around the viability of certain research designs and method options.

8.5.1 The Imprecise Nature and Broadness of the Concept

Human aspects of agility and in particular, AOHR strategy and their related research and theories are still in their infancy stage and suffer from a lack of clear definition and comprehensive conceptualisation. This gap motivated an exploratory approach to develop a holistic conceptualisation of AOHRM. Given the imprecise and subjective nature of agility as a concept, being multi-faceted, and the multidimensional feature of strategic

HRM, makes the attempt for integration and coupling these two areas in a concise and clear manner a daunting task. Thus, the main challenge was to develop a research design capable of dealing with the complexities of the research and allowing for the identification of all the different issues related to the subject.

In response, the researcher has attempted to widen the scope of the study by reviewing literature in various fields such as strategic and organisational agility, agile manufacturing and supply chain agility, strategic management, SHRM, and organisational dynamic and change, also by collecting a rich body of data from both primary and secondary sources. However, in the absence of a comprehensive investigation of the attributes of AOHRs in prior studies, the elements and constructs identified in this research are merely an initial effort towards building a more vigorous understanding, as there might be some issues that this study has not come across as part of its empirical investigation.

Moreover, the concept of strategy formulation can include several main issues including the nature of the strategy, its process (both strategic planning and implementation), contents and formation, each of them consists of a series of aspects and steps. In addition, a large number of contextual factors influence the content of an organisation's HRM strategy, which their analysis can be fitted in a separate PhD study due to broadness.

Considering the inherent broadness of the subject, and the time and funding constraints of this study, it was decided to focus on just the content aspects of strategy formulation, with the empirical stage focusing particularly on the constructs of agility capabilities and agility providers. However, due to the inductive nature of the study, developing an understanding of the AOHRs concept has inevitably involved consideration of elements which were out of the planned scope of the investigations. Therefore, although the study provided insights about the issues of strategy formation, agility drivers and their impacts on AOHRs, they were not considered directly as part of the initial scope. Thus, it is acknowledged that further research is required for addressing the limitations associated with these issues.

Due to the underdeveloped nature of previous research, and the need for detailed exploratory explanations and insights, qualitative approaches and in particular, case study design could serve as the most appropriate research design, especially when the focus is on investigations of strategic process. However, due to the tight timeframe of the research and

the absence of a live agility implementation, matching with the time-period planned for data collection, the longitudinal case study design was not practical within the timescales.

Alternatively, the semi-structured interview technique and the inclusion of a wider range of organisations were considered, firstly as a deliberate choice, secondly as a suitable design to obtain a breadth of insights about the concepts under the study. This design served the research main focus on investigations of strategy contents especially well. However, to build a richer understanding of the ‘process’ aspects of AOHRs formulation, and to identify factors that influencing the shaping and selection of AOHRM strategies and practices, a longitudinal case study design would be helpful.

Although generalisability and representation was not as important as the research ability to uncover the complex phenomenon of AOHRs, it was attempted to include a cross section of organisations to extend the range of industries studied, as well as including both private and public sectors. Given that industry is an important contingency factor influencing the nature of AOHR practices, the current findings can be validated across a wider range of industries, with different markets characteristics, and in relation to different agility strategies/postures.

Finally, the study developed a conceptual model for AOHR strategy, identifying the main constructs and elements constituting an AOHR strategy and the relationship between these factors. However, empirical validation of the model was not feasible within the timescales of the research.

8.6 Managerial Implications of the Research

Despite its limitations, the research has some practical implications for HR professionals, business leaders and HR directors. The first news for the practice is that organisational capabilities for agility can be developed and managed. These capabilities need to be purposely pursued, even though evolutionarily. The empirical findings of this research, synthesised with the extensive body of literature, shed light on the path to organisational agility and the contributions that HR can make in this journey. The main HR roles and contributions are discussed here, but before that, some important points about the significance of AOHR strategy need to be made:

The study findings highlighted the criticality of a supportive organisational culture along with a supporting HRM strategy and a system for creating organisational capabilities for agility. This implies that HR professionals can help their organisations in achieving agility by crafting and implementing a HR strategy which forges a set of core values consistent with the requirements of agility and building a highly dynamic HR system which facilitates a quick response to the dynamic of the environment by an easy and fast reconfiguration of human resources and their competencies, and HR processes, routines, and practices.

The conceptual model proposed by this research provides guidance on the process of formulating an AOHRs, through clarifying a line of sight from drivers of agility back through a set of context-specific organisational agility capabilities to a set of necessary HR capabilities and finally relating them to a set of HR agility providers. The proposed 4-steps model of AOHRs formulation and the corresponding insights provided on the contents of the AOHRs can be used to undertake the initial planning of the HR strategy and system, and to specify their desired organisational culture and employees' mindset and behaviours, while ensuring that plenty of room is left for experimentation and the evolution of the HR strategy.

HR function, in order to contribute to organisational agility, should act as a strategic facilitator. It has several main responsibilities; among them the development of an agile workforce is of paramount importance.

8.6.1 Developing Workforce Agility Capabilities

In order to develop an agile workforce, the findings would suggest that HR should focus on two important tasks: 1) Developing a human capital pool possessing a broad repertoire of skills, knowledge and behaviours, 2) Promoting agility-oriented mindset and behaviours. To develop workforce agility capabilities, the findings have a number of implications as follows:

HR so as to quickly respond to the unprecedented challenges and changing requirements of the business, needs to ensure that various combinations and configurations of workforce capabilities can be achieved to take advantage of emerging situations or to overcome the arising threats. To quickly and easily achieve the various combinations and configurations

of workforce capabilities, HR needs to develop a human capital pool possessing a broad repertoire of skills, knowledge and behaviours.

This necessitates having individual employees with a broad set of skills, knowledge and experiences to be able to assume multiple roles and tasks and to quickly move between assignments and perform in different capacities across different levels and projects, even external organisational boundaries. Of equal importance is the promotion of flexibility and adaptive behaviours among the workforce. HR teams and managers should ensure that employees, in addition to a wide range of skills, possess positive attitudes and mindsets to the changes, and have flexible and adaptive behaviours to rapidly redeploy different roles.

HR should also take into account the issue of the collective competencies of the workforce, as they might decide to obtain the broad repertoire of skills in two different ways: by having a fewer number of multi-skilled employees, who acquire a broad range of skills, or by hiring a larger number of individuals who have narrow but special sets of skills and deploy and redeploy them across different projects and tasks wherever their skills are required.

In addition, HR needs to be aware that obsolescence of capabilities accelerates in turbulent environments (Drucker, 1980). Thus, both competency building and a speedy renewal of competencies are equally important to achieve a dynamic fit within changing business environments. Thus, as equal significance, is the continual evaluation of contextual information and reassessment and innovation of the necessary workforce's skills and behaviours to ensure that workforce capabilities can accommodate the current and future requirements of the business. In other words, by developing a broad repertoire of workforce agility capabilities and an ongoing renewal of these capabilities, HR provides the organisations with potential human resource capabilities to pursue alternative strategies.

The findings associated the achievement of workforce agility capabilities with a number of mental and behavioural traits as detailed in Tables 4.4. However, different workforce agility capabilities outlined in Table 4.4 are not equally important across different firms. Therefore, each organisation should identify and develop their unique workforce agility capabilities in response to the distinctive agility drivers they are facing, and to the specific sets of organisational agility capabilities they pursue, correlating to their unique

circumstances, goals and business objectives.

Moreover, HR needs to ensure that employees are motivated to utilise their capabilities, translate their skills into performance and manifest the agile behaviours. To do this, a wide range of employee motivation and retention interventions such as flexible work models, effective mobility programmes, empowerment, career coaching and developmental schemes are introduced in Table 6.4, which can be applied accordingly.

8.6.2 Creating Facilitative Environment and Organisational Context for Agility

HR, in order to facilitate agility, needs to create a facilitative environment and an organisational context for agility. Thus, another important HR role is creating and maintaining an organisational culture that values, recognises, rewards and enhances the behaviours required for organisational agility. To foster an agile culture, the findings suggest that HR teams and leaders direct their attention to reinforcing a set of shared values such as personal accountability, empowerment, autonomy in decision making, trust, openness, honesty, risk taking, innovation and creativity as outlined in detail in Table 6.2. The fundamental role that HR can play in these regards are outlined in Table 4.5.

8.6.3 Adoption of AOHR Practices and Their Contingency Relationship with Business Strategies

HR teams can evaluate and select from the list of AOHR practices (see Table 6.4) identified in this research to develop workforce agility capabilities. While a list of the appropriate AOHR practices is provided, it does not imply that AOHR strategy is reliant on a set of 'best' practices. Although many of the identified practices in Table 6.4 are commonly perceived by the participants as effective in promoting agile attributes and creating organisational agility, they should not be considered as a prescriptive list of HR best practices to apply to all organisations. Rather, it serves to focus the effort of HR professionals and to clarify their thinking when determining the requisite HR principles and practices.

Some important issues to consider include:

1. The universal adoption of the identified AOHR practices is not suggested. Considering the criticality of business strategy-HR practices alignment, HR professionals should assess, select, and align appropriate HR practices matching with their unique business and HR strategies and desired agile people attributes.

2. HR professionals also need to continually reassess business conditions (agility drivers) and the suitability of individual and bundles of HRM practices in relation with the required organisational and workforce competencies and capabilities which are subject to change due to the dynamic of the business environment and the changing nature of business strategies and directions (dynamic vertical fit). They need to consider that some AOHR practices are more appropriate under certain strategic conditions/postures and less appropriate under others.
3. None of the identified AOHR practices can guarantee agile behaviours in isolation. They all need to be applied in harmony and must be integrated and aligned with each other (horizontally) to support each other in promoting the agile behaviours. The existence of a HR strategy is necessary to direct the selection of these practices and links the various aspects of HR activities in pursuit of a set of common purposes. For instance, some of these agility-oriented practices such as delegating more decision-making to individuals and teams, fluid assignments and outsourcing carry risks as they have the potential to increase interdependency and can lead to chaos or overload for both individuals and teams. Thus, they should be supported by a series of HR activities that develop a sense of common purpose, promote core values, facilitate collaborations and motivate employees.
4. Organisational and HR infrastructures such as communication systems, IT and HR technologies, and reward system should be capable and flexible enough to manage the complexity which comes with the application of these new series of HR practices

8.6.4 Enhancing the agility of HR function and HR teams

Pursuing agility, and the formation and implementation of an AOHR strategy is not an easy task. It undoubtedly increases the complexity of the HR teams' jobs. This necessitate that HR professionals have comprehensive knowledge of their business strategy and their organisational context, of their required skills and agile attributes, and that they also possess considerable HR knowledge to realise and decide which practices will promote those skills and attributes and lead to organisational agility. They not only need to have knowledge about the most appropriate AOHR principles and practices, but should also be

aware of the HR practices that fit best with the changing directions of the organisation's strategies.

8.7 Recommendations for Future Research

As briefly mentioned in section 8.5, due to the broadness of the research subject, there are several areas in this research which deserve further investigations and future research. In addition, the significant findings of the research, have several possible implications for future research. Thus, the following directions for future research can be suggested:

Firstly, the study developed a conceptual model for AOHR strategy, addressing both process and content aspects, whilst the planned scope of the investigations was on the content part. Obviously, the analysis and interpretation and suggested recommendations for practice rest on a rather sparse empirical foundation. It is hoped that the findings of the research attract the interest of SHRM and agility researchers in further clarifying HR strategy making in pursuit of agility. Researchers can utilise the proposed conceptual model in other types and sizes of organisations, or across a wider range of firms and industries, or as a framework for a broad international study. They can address the following potential issues and questions:

- 1- This research identified AOHR strategies tend to be emergent and evolutionary, and AOHR practices arise gradually rather than following a formal proactive planning mechanism. Further research needs to particularly focus on the process aspects of strategy making to obtain a richer picture of AOHR strategy formulation, uncovering how and why HRM strategies and its components -AOHR principles, policies and practices, are actually adopting and transforming along with strategic agility development. Further investigations are also required to examine the extent to which that reliance on the emergent approach in which AOHR strategies develop over time with minimum deliberate and proactive planning, can meet the requirement of strategic agility.
- 2- Moreover, in-depth case studies are needed to:
 - Examine the link between contextual factors (agility drivers), strategic change and transformations (agility strategies), and the HRM strategies.
 - Identify the effect of external environmental factors (economic, competitive conditions, technological, legal and socio-political) as well as internal organisational

context (culture, organisation size and structure, leadership culture, technology and growth path) on the formation of the content of HR strategies and the adoption of AOHR practices.

- Examine the extent of which the above contextual factors differ across organisations, to justify the need for designing a unique AOHRs for each organisation
 - Examine whether generalising AOHRs across different firms makes conceptual sense.
- 3- The research identified a series of AOHR principles and practices to develop workforce agility capabilities. Further studies are needed to
- Test whether or not each desired workforce agility capability is addressed by a single or multiple HR practices, to examine if they are all necessary, and together are sufficient to create agile workforce.
 - Examine the extent to which that adoption of these principles and practices affected the promotion of the required workforce agility capabilities, especially mindset and behaviours.

Secondly, further case-based investigations are needed to study the various types of agility strategies, and the required HR and workforce agility capabilities to support each type of strategic postures, and their practical implications on the choice of HR strategy and the component of HR system. In particular, identify the appropriate HRM philosophies and bundle of HR practices which most support the implementation of each type of agility postures.

Thirdly, the study identified a series of AOHR practices which were deployed and perceived by the participating companies as having the greatest effect on creation of workforce agility capabilities. It is acknowledged that these findings are mainly based on perceptual measures and represent a 'snap-shot' of circumstances prevailing at a point in time. Examining the impact of AOHR principles and practices adoption on the level of workforce agility capabilities, demands a longitudinal case study design to capture the experience from adoption to implementation and the performance measurement stages.

Especially, as workforce agility capabilities are not driven exclusively by AOHR principles and practices, but the interplay between HRM system, organisational culture and infrastructures, structure, and leadership culture. Thus, a longitudinal case study would

assist in developing a richer understanding of this interaction as well as allowing a better examination of the HR function *journey* towards becoming agile in general.

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APPENDICES

Appendix A1: Core Papers on Workforce Agility (WA) And Agility-Oriented Human Resource Management (AOHRM)

Number	Papers	Contribution	
		WA	AOHRM
1	Shafer, R. (1997). Creating organizational agility: The human resource dimension. Unpublished Ph.D. dissertation, Cornell University.	✓	✓
2	Dyer, L. & Shafer, R. A. (1998), "From Human Resource Strategy to Organizational Effectiveness: Lessons from Research on Organizational Agility". CAHRS Working Paper Series. Paper 125. http://digitalcommons.ilr.cornell.edu/cahrswp/125 Also published as: Dyer, L. & Shafer, R. (1999). From human resource strategy to organizational effectiveness: Lessons from Research on Agile Organizations. In P. Wright, L. Dyer, J. Boudreau & G. Milkovich (eds). Research in Personnel and Human Resource Management (Supplement 4 - 1999: Strategic Human Resource Management in the 21st Century).	✓	✓
3	Shafer, R., Dyer, L., Kilty, J., Amos, J. & Ericksen, J. (2001). Crafting a human resource strategy to foster organizational agility: A case study. Human Resource Management, 40, 197-211.	✓	✓
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18	Nijssen, M., & Paauwe, J. (2012). HRM in turbulent times: How to achieve organizational agility? <i>The International Journal of Human Resource Management</i> , 23(16), 3315-3335.	✓	✓
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Appendix A2: Definitions of Agility

Definition	Authors
“A manufacturing system with capabilities (hard and soft technologies, human resources, educated management, information) to meet the rapidly changing needs of the marketplace (speed, flexibility, customers, competitors, suppliers, infrastructure, responsiveness)” (Cited in Yusuf et al., 1999:36).	The creators of agility concept at the Iacocca Institute, of Lehigh University (USA)
The ability to thrive in an environment of continuous and unpredictable change. "change" is the focal point and agility includes both the ability to initiate and the ability to respond to change. "Thrive" implies long term success by acquiring both offensive as well as a defensive capability.	Dove (1993)
Agile manufacturing: A synthesis of existing technologies and methods of organizing production, wherein flexibility and speed are key contributors to agility	Goldman and Nagel (1993)
A rapid and proactive adaptation of enterprise elements to unexpected and unpredicted changes	Kidd (1994)
The ability of companies to cope with unanticipated changes, to deal with unprecedented threats from business environment, and to take advantage of rapidly changing, continually fragmenting, global markets by providing customers with high-quality customised products, services and solutions. Agility means delivering value to customers, being ready for change, valuing human knowledge and skills, and forming virtual partnership	Goldman et al. (1995)
The ability to “produce the right products at the right place at the right time at the right price”	Roth (1996: 30)
The ability to produce and market successfully a broad range of low cost, high-quality products with short lead times in varying lot sizes, which provide enhanced value to individual customers through customisation	Vokurka and Fliedner (1998)
Agility relates to the interface between the company and the market. Agility acts as a pillar to improve competitiveness and the business prospects.	Katayama and Bennett (1999)
The capability of surviving by reacting quickly and effectively to changing markets, driven by customer-designed products and services	Gunasekaran (1999)
Organisational agility: the ‘successful exploitation of competitive bases (speed, flexibility, innovation proactivity, quality and profitability) through the integration of reconfigurable resources and best practices in a knowledge-rich environment to provide customer-driven products and services in a fast changing market environment’	Yusuf et al. (1999:37)
The ability of enterprises to cope with unexpected changes, to survive unprecedented threats from the business environment, and to take advantage of changes as opportunities. Agility includes two main factors: (1) responding to changes (anticipated and unexpected) in due time; and(2) exploiting and taking advantage of changes as opportunities.	Zhang and Sharifi (2000) Sharifi and Zhang (2001)
Agility is defined as the ability of an organisation to respond rapidly to changes in demand, both in terms of volume and variety.	Christopher (2000)
Agility means using market knowledge and virtual corporation to exploit	Mason-Jones et al.

profitable opportunities in a volatile market place.	(2000)
The organisation's capacity to gain competitive advantage by intelligently, rapidly and proactively seizing opportunities and reacting to threats	Meredith and Francis (2000)
An overall strategy focused on thriving in an unpredictable environment and a response to complexity brought about by constant change.	Sanchez and Nagi (2001)
The ability to detect and seize market opportunities with speed and surprise to marshal the necessary knowledge and assets for seizing those opportunities. Agility encompasses both the exploration and exploitation of opportunities.	Sambamurthy et al. (2003)
"The ability to quickly recognize and seize opportunities, change direction, and avoid collisions" enabling a firm to initiate and apply flexible, nimble, and dynamic competitive moves in order to respond positively to changes imposed by others and to initiate shifts in strategy to create new marketplace realities"	McCann (2004: 47)
The capacity to identify and capture opportunities more quickly than do rivals	Macias-Lizaso and Thiel (2006)
"Moving quickly, decisively, and effectively in anticipating, initiating and taking advantage of change"	Jamrog et al. (2006: 5)
Summarised different definitions of agility as the ability to quickly and efficiently adapt and respond proactively to continuous and unpredictable changes in the external environment in order to seize potential opportunities. It necessitates the two main factors of the agility concept which are <i>responding</i> and <i>exploiting</i> .	Sherehiy (2008)

Appendix A3: SHRM and Emergent Organisational Capabilities, sources:

(*Jackson et al., 2014) and (**Hansen and Güttel, 2009)

SHRM and Emergent Organisational Capabilities	Authors	Note
SHRM and Organisational Flexibility	(Beltrán-Martín et al., 2008)	“High-performance HRM systems can influence financial performance by increasing employees’ flexibility to respond to alternative strategies” *
	Wright and Snell (1998)	They defined HRM flexibility as “the extent to which the firm’s human resources possess skills and behavioural repertoires that can give a firm, options for pursuing strategic alternatives in the firm’s competitive environment, as well as the extent to which the necessary HRM practices can be identified, developed, and implemented quickly to maximize the flexibilities inherent in those human resources.” They recognised two types of flexibility for HRM practices as resource flexibility and coordination flexibility. The resource flexibility of HRM practices is “the extent to which they can be adapted and applied across a variety of situations” and the coordination flexibility of HRM practices is about “how quickly the practices can be re-synthesized, reconfigured, and redeployed” (Lengnick-Hall et al., 2009:66)
SHRM and Innovation	(Ceylan, 2013)	“Commitment-based HRM systems improve firm performance by promoting product-, process-, and organisation-focused innovation activities.” *
	(Jackson et al., 1989; Schuler and Jackson, 1987a).	“Specific HRM policies and practices may be uniquely supportive of the employee behaviours required for innovation” *
	(Chang et al., 2013),	“High-technology firms operating in a dynamic environment can use organization-level arrangements to enhance their absorptive capacity, facilitate learning among core employees, and translate such learning into competitive advantages such as market responsiveness and innovativeness. The authors developed new measures to assess resource-oriented and coordination-oriented flexible HRM and then showed that each type of flexible HRM system enhances market responsiveness and firm innovativeness by fostering absorptive capacity among core knowledge employees.”*
SHRM and Dynamic Capabilities	Camuffo and Volpato (1995)	“Discuss the role of HRM in a change process by using a case study of FIAT.” **
	Harvey (2000) and Harvey et al. (2004)	“Theoretical papers: highlight the role of global staffing for keeping organizations flexible and adaptive.” **
	Thompson (2007)	“From a practice-based perspective, he investigates the role of dynamic capabilities in shaping innovations in HRM practices. In a case-study based research, he found out that the characteristics of the context (e.g. Industry, production system) and the power structure within the firm impeded the implementation of novel HR bundles in a coherent way.” **
	Ghanam and	“Investigate the intersection of HRM and dynamic capabilities in a

	Cox (2007)	short exemplary case study. They emphasize the focus of HRM on maintaining an organizational culture, the treatment of employees and the integration of HRM and strategy as dynamic capabilities.” **
	Chadwick and Dabu (2009)	“They stressed the role of entrepreneurship. Accordingly, HRM has to develop an organizational context where entrepreneurial behaviour is facilitated that supports a firm to overcome the danger of rigidities.” **
	(Hansen and Güttel, 2009)	“ SHRM provides practices for knowledge development and for governing employees that have to be configured in a way to create and maintain differently shaped dynamic capabilities according to environmental dynamics (Güttel et al., 2009). They review the role of knowledge development and of governance mechanisms as main characteristics of the internal labor market (ILM) and the high-commitment work (H-C) (Baron and Kreps, 1999) SRHM systems for the development and maintenance of dynamic capabilities in high-velocity and in moderately dynamic markets. An organization’s decision whether to use ILM or H-C or any combination of both systems is also dependent on the employee’s level of background knowledge. They identified four strategic fields where different dynamic capabilities are required that have to be established and maintained by different SHRM systems: (1) replication stability, (2) administrative stability, (3) continuous change, and (4) structural ambidexterity” (Hansen and Güttel, 2009)

Appendix B1: Letter of Introduction/Invitation



BCU Organisational Agility Research Study

CIPD (2011) defines **agility** as a state of being 'change-ready' with an attitude of 'being prepared to keep moving, changing and adapting'.

At the heart of the agility concept are the notions of **speed, flexibility, adaptability** and **customization**.

Exploring the Human Resource Aspects of Organisational Agility

Dear Sir/Madam,

Birmingham City Business School has been conducting a study into organisational agility. As part of this, I am currently undertaking a PhD research which aims to explore the human aspects of agility. The results we have obtained so far demonstrate that agile organisations can deal with unanticipated changes more proactively through ensuring their people are capable of responding more rapidly to alternations in markets and, in particular customer dynamic demands.

My research aims to explore people management practices which can facilitate the process of building and sustaining agility capabilities. Given that the emphasis is on people management, I would greatly appreciate learning more about the way your organisation has empowered and developed its employees to understand and embed the concept of agility in all of their dealings and decisions.

My purpose in writing to you is to invite you to collaborate in our study. In particular, I would like to have interviews with your HR professionals, and possibly key individuals who have been involved in improving your organisational responsiveness and agility. Each interview runs for approximately 60 minutes and will be audio taped so that I can accurately reflect on what is discussed. All information provided by you will be treated as confidential.

Your collaboration would be extremely beneficial to the success of the project and your help would be highly appreciated. We will be happy to provide you with our findings to assist you in developing your agility-oriented people management strategy.

If you wish to know more, please contact me by calling 07538581830 or emailing either myself or Dr. Steve McCabe (steve.mccabe@bcu.ac.uk). We look forward to hearing from you.

Kind regards,
Farzaneh Azisafaei
Doctoral Researcher
Birmingham City Business School

Phone: + 44 (0)753 858 1830
E-mail: Farzaneh.Azisafaei@mail.bcu.ac.uk

Appendix B2: Information for Research Participants

Exploring the Human Aspects of Organisational Agility
Developing 'Workforce Capabilities' for 'Organisational Agility' through Agility-Oriented Human Resource



You are being invited to take part in Birmingham City University's research into Organisational Agility. We would like you to take a few minutes to read this information sheet before making up your mind about whether or not you would like to help us with our research. Please ask us if there is anything that is not clear or if you would like more information. Thank you for reading this

The Research's Purpose:

My research aims to explore the human aspects of Organisational Agility. In particular, it aims to explore forms of People Management strategies/practices that organisations deploy to build and sustain agility capabilities/attributes.

Definition of Organisational Agility:

The general definition that this research has considered for Organisational Agility is: "The ability to scan continuous and unpredictable changes in the external environment, quickly and efficiently adapt and respond to change especially customers' dynamic demands and proactively taking advantage of change as opportunity." (Goldman et al., 1995; Zhang and Sharifi, 2000; Sharifi and Zhang, 2001; Sherehiy et al. 2008)

It has been suggested that "the most critical traits of agile organisations are:

- Leadership in innovation
- Fostering a superior customer experience
- Rapid decision-making and execution
- The ability to access the right information at the right time and the ability to turn knowledge into value
- Flexible management of teams and human resources"

While business model, technology and workplace design are important factors in enabling organisations to become more agile, the role of corporate culture and people management strategy are also significant.

My research proposes that an **Agility-Oriented People Management Strategy** can provide conditions for nurturing agility-oriented "mindset and behaviours" and "workforce agility capabilities".

The Agility-Oriented People Management Strategy needs to be supported by an Agility-Oriented Organisational Infrastructure.

My main questions are:

- **What are the key environmental pressures for your company which have created the needs for crafting agility strategy and in particular agile HR and talent management strategies? (Agility Drivers)**
- **What are the characteristics of agile employees/ managers which are central to achieving agility?**
- **What is the role of organisational culture in achieving agility? What are the key characteristics of organisational culture that is critical and supportive in creating organisational agility?**
- **What roles do you consider for HRM in developing agile culture and agile workforce?**
- **What HR initiatives and practices are being used by your organisation which you perceive as effective in promoting workforce agility?**
- **What are the characteristics of an agile HR function?**

Why have I been chosen?

We are looking for organisations which operate in a complex and unpredictable business environment. Given that the emphasis of the research is on Organisational Agility and People Management, we would like to know how they obtain organisational and HR agility capabilities to thrive or survive.

We believe that you can make an important contribution to the research by providing important information about the way that your organisation has empowered and developed its employees to understand and embed the concept of agility in all of their dealings and decisions.

Do I have to take part?

Your participation is voluntary. If you do decide to contribute, you will be given this information sheet to keep (and be asked to sign a consent form) and you can still withdraw at any time without giving a reason.

What will happen to me if I take part?

To be involved in this project, I will ask you to provide me an opportunity to have an interview with you. In particular, we will discuss how people management initiatives and practices can improve workforce agility. Each interview runs for no more than 60 minutes at a mutually agreed upon time and place.

Will I be recorded, and how will the recorded media be used?

Each interview will be audio taped so that we can accurately reflect on what is discussed. The audio recordings of our interviews will be used only for analysis. No other use will be made of them without your written permission, and no one outside the project will be allowed access to the original recordings.

Interviews' audio files will be transferred to a password protected computer as soon as possible after recording. They will be stored digitally on a password protected computer and backup system and will be erased from mobile storage devices such as memory cards and memory sticks. Following completion of the research project, when interview recordings are to be disposed or archived, we will ensure that your rights to confidentiality and anonymity are maintained.

Will my taking part in this project be kept confidential?

All information you provide to us during the course of the research will be kept strictly confidential. Only members of the research team will have access to it. You will not be able to be identified in any reports or publications unless you wish to be identified.

What will happen to the results of the research project?

The outcomes of the research will be published in a PhD thesis, papers in peer reviewed academic journals and also papers which will be presented in management conference and seminars. No individuals will be identifiable in these publications.

What are the possible benefits of taking part?

It is hoped that we will be able to provide your organisation with our findings to help you in developing your Agility-Oriented People Management Strategy, whilst there are no immediate benefits for those people participating in the project.

What are the possible disadvantages and risks of taking part?

There are no known risks or disadvantages associated with this study. The recording procedure should not cause any discomfort.

You can be assured that any information provided by you in the interviews will be treated as confidential at all times and can be anonymous if you wish i.e. no personal details relating to you or where you work will be recorded anywhere. Only members of the research team will have access to the information you provide to us.

Who is organising and funding the research?

This research is a PhD research funded by Birmingham City University under the URDF Research Student Bursary Agreement Terms and Conditions. No individual or company will benefit financially from this research.

Who has ethically reviewed the project?

This study has been ethically reviewed and approved by the Faculty Academic Ethics Committee in conformance with the research ethics policy of Birmingham City University which is based on the Revised Ethical Guidelines for Educational Research (2004) published by the British Educational Research Association.

If you are interested and happy to participate in this research, please complete and sign the attached consent form and return it to us. Please keep this information sheet in a safe place for future reference. Thank you for having taken the time to read this.

For further information, please contact:

Farzaneh Azizsafaei, Doctoral Researcher, Birmingham City Business School, Mobile: 07538581830, E-mail: farzaneh.azizsafaei@mail.bcu.ac.uk,

My supervisory team:

Dr. Steven McCabe, Director of Research Degree Programmes, Birmingham City Business School, Tel. 0121 331 5178, E-mail: steve.mccabe@bcu.ac.uk,

Professor Mike Brown, Head of the Centre for Corporate Reputation and Strategy
Birmingham City Business School, Tel. 0121 331 7941, E-mail: mike.brown@bcu.ac.uk

My external advisor:

Dr Hossein Sharifi, Agility advisor and leader of agile manufacturing research at the University of Liverpool Agility Centre, Tel. 0151 795 3622, E-mail: H.Sharifi@liverpool.ac.uk

Appendix B3: Interview Protocol: Themes and Questions

Part 1. Background Information

Respondent Profile
Name, Job Title
General Organisational Background
Type, Number of employees, Industry, Specialties
Overview of Their Agility Programme
What is the primary focus of your programme? <input type="checkbox"/> Product Design and Manufacturing Agility <input type="checkbox"/> Supply Chain Agility <input type="checkbox"/> IT Infrastructures <input type="checkbox"/> People management <input type="checkbox"/> Workplace Design
Main aims of the program: <input type="checkbox"/> Increasing Responsiveness to Change <input type="checkbox"/> Increasing Speed in Delivery/ New Product Introduction <input type="checkbox"/> Increasing Flexibility <input type="checkbox"/> Cost Minimization <input type="checkbox"/> Improve Customers' Experience by Customisation of Services/Products <input type="checkbox"/> Increasing Total Competency of the Organisation by Quality Improvement <input type="checkbox"/> Extending Collaboration/Partnership with Suppliers <input type="checkbox"/> Achieving Leadership in Innovation
<ul style="list-style-type: none"> • Will you explain the nature of the agility programme in your organisation? • How strong was the perceived need to achieve agility? • How did the implementation of agility programme start? Any plans or Strategies?
Agility Drivers: Conditions of the Organisations' Business Environment
<ul style="list-style-type: none"> • How do you evaluate the circumstances of the business environment for your organisation? • What are the main challenges and pressures that you have been facing during the recent years? • For instance, how do you evaluate the position of the following environmental pressures for your company: Customer Requirements, Marketplace, Competition Basis, Technology, Social Factors, Legal and Ethical Factors?
HR Agility Drivers
<ul style="list-style-type: none"> • What are the main challenges and pressures that your HR have been facing during the recent years? • For instance, how do you evaluate the position and <i>implications</i> of the following environmental pressures for your HR? rapid business change, changes in employment expectations, intense competition for talent, advances in technology, ...
Agility at the Organisational Level
The perception/definition of the participating organisations about the concept of agility <ul style="list-style-type: none"> • What does being <i>Agile</i> really mean? What is your perspective on agile organisations?

Part 2. The Five Research Questions and Their Related Points of Checks

RQ1: What is the role of organisational culture in achieving agility? What are the key characteristics of organisational culture that is critical and supportive in creating organisational agility?

- In your opinion, what is the role of organisational culture in achieving agility?
- What are the key characteristics of organisational culture that is critical and supportive in creating organisational agility?
- Has the company tried to change the dominant culture and reinforce a new set of values which enable more agility?
- What new set of values has been considered as supportive in creating organisational agility?
- What cultural barriers exist for agility development and what resistance you have met?
- In your opinion, does the organisation shared value statement reflect the requirements of agility?

RQ2: What are the characteristics and attributes of people which are central to achieving agility?

Agility at the Individual Level

- In your opinion, how agility can be conceptualised at the individual level? How do you define *Agile Workforce*?
- Do you see agility as Personality/individual characteristics which are internal to individuals? Or do you see it as a combination of personality and organisational factors such as career model, culture etc?
- Do you think that employees in agile organisations should have distinctive set of characteristics?
- If yes, what are these distinctive characteristics (Behaviours/Mind Set/Capabilities/Skills) which are central in achieving organisational agility?
- Should all individuals possess these characteristics? How these attributes might be different for different roles?
- Which of these attributes is inherent individual personality that should be identified and obtained during the selection process?
- Which of these attributes can be developed through training and development and other HR practices? What HR and management practices can help to create these attributes among workforce?
- Have you defined the employee agility attributes as part of your agility programme?
- Does the organisation's behaviours/competency model reflect the agile attributes?

RQ3: What are the roles of HRM in achieving organisational agility?

- In your opinion, how HRM can contribute in achieving organisational agility?
- What roles do you consider for HRM in creating an organisational culture that is supportive for agility?
- What roles do you consider for HRM in developing agile mindsets and behaviours among employees?
- What alterations should happen in HRM in order to contribute to organisational agility?

<ul style="list-style-type: none"> • How do you evaluate the appropriateness of your HR system for supporting agility?
<p>RQ4: What are the characteristics of an agile HR function?</p> <ul style="list-style-type: none"> • In your opinion, what conditions need to exist within an HR function to be able to make contributions in development of organisational agility • What changes you have had in your HR function (structure, model, administration) alongside your agility programme? • How your HR models have changed along with your agility programmes? • Are there any specific HR technologies or software systems that you have been using which brought agility into your HR functions? • What specific skill and competency do you think HR professionals need to acquire in order to have an agile HR function?
<p>RQ 5: What HR practices are being used by organisations and perceived as effective in achieving organisational and workforce agility?</p> <ul style="list-style-type: none"> • What <i>HR Initiatives and Practices</i> do you consider as effective for developing workforce agility?
<p>1- Work Design/ Career Model</p> <ul style="list-style-type: none"> • In your opinion, how work design can affect positively/negatively on the achievement of agility? How work design can enhance/hinder workforce agility? • How roles and job descriptions are defined in your company? How they are reviewed? Are they aligned with the requirements of agility? • What forms of work design practices you have deployed that enhance flexibility and responsiveness in your organisation? • What methods/mechanism/practices are being used that facilitate moving employees between roles/assignments? Ask about the possible effects of flexible assignment, cross-functional work assignments, job rotation, secondment, *flexible working , *Agile working
<p>2- Staffing</p> <ul style="list-style-type: none"> • In your opinion, how recruitment and selection process should reflect the requirements of agility? • To what extent do you think that selection criteria should consider the organisational value and desired agile behaviours? • To what extent selection criteria and processes reflect the desired agile attributes in your organisation? • To what extent your organisations use contingent workforces? How do you evaluate its effects on agility? • What do you think about the principle of “Hire for attitude first and specific skill second” with regard to agility? • * How do you evaluate the effects/importance of access to workforce data? Do you use any specific information system for workforce planning?

*** 3- Talent Management**

- How do you evaluate the intensity of competition for talent in your industry? Are specific talent management strategies crafted to deal with this issue and stimulate changes required for agility? If yes,
- How do you evaluate the importance and effects of the following factors in increasing agility?
 - Creation of flexible and agile talent pools
 - Talent acquisition strategies: employment branding , broader recruiting sources such as social media, Continuous recruiting as opposed to episodic, internal hiring
 - Talent mobility programs
 - Employee Retention interventions: development potential , competency management systems, career path planning

4- Performance Management

- In your opinion, how performance management system should reflect the requirements of agility?
- To what extent do you think that performance expectations should consider the desired agile behaviours and shared values? What are included in your performance expectations?
- How do you evaluate the effects/importance of a continuous performance appraisal and real-time feedback to employees in enhancing agility?
- How often do you conduct performance appraisal and what mechanisms do you use for providing real-time feedback to employees?

5-Learning and Development

- What roles do you consider for L&D in development of agile attributes and organisational culture which is supportive for agility? In your opinion, how L&D should play this role?
- What are the main aims of L&D in your organisation? Who are the target of this programmes? Everyone or core employees?
- In your opinion, what should be the content and focus of learning and development in organisations pursuing agility?
- Who has ultimate responsibility for identifying and developing necessary competencies and attributes in the organisation?
- How do you evaluate the importance of integration between L&D and other HR practices such as performance management and talent management for agility development?
- What formats of L&D, or specific L&D initiatives are used in your company which support continuous capability development in your organisation?

6-Communication

- How do you evaluate the importance/effects of communication in promoting workforce agility?
- How communication framework/structure can facilitate creating workforce agility?
- What principles are behind your communication practices which reflect requirements of agility?
- What mechanisms are being used that facilitate communication in your company?

7-Empowerment
<ul style="list-style-type: none"> • What roles do you consider for empowerment in promoting agility? • How do you think localizing decision making power might affect workforce agility? • How do you promote empowerment in your organisation? How do you manage balance between control and autonomy?
8-Reward & Recognition
<ul style="list-style-type: none"> • How do you evaluate the importance/effects of rewards and recognition in promoting workforce agility? • Are particular rewards and recognition mechanisms used to increase employee engagement and agility? • Do you reward people for their behaviours? If yes, how do you evaluate the effects of behaviors -based rewards and recognition in promoting agile attributes?
9-Leadership and Employee Relations
<ul style="list-style-type: none"> • How do you evaluate the importance/effects of leadership in promoting workforce agility? • In your opinion, what kind of leadership style can be more supportive for establishing agility-oriented behaviours? • What sorts of manager-employee relationship are more supportive for agility?
*10-Employee Engagement
<ul style="list-style-type: none"> • How do you evaluate the importance/effects of employee engagement in promoting workforce agility? • What mechanisms are being used to boost employee engagement?
Are there any HR initiatives taken place in line with the implementation of the agility programme? If yes, what are they?

Appendix B4: Consent Form



INFORMED CONSENT FORM

I, the undersigned, hereby declare that I agree to participate in this audio digitally recorded interview for the study to be carried out by researcher *Farzaneh Azizsafaei* entitled:

The Role of the Human Element in Achieving Organisational Agility: An Examination of HRM Contributions

I further declare that I have read the [Research Information Sheet](#) and understand the purpose of the research, that it will be used as part of a Doctorate programme, being undertaken by researcher *Farzaneh Azizsafaei* at Birmingham City University, that it will be stored and accessed solely by the researcher and that it will not be disclosed. I also understand that it can be used for research output based on such research and that my anonymity will be guaranteed.

By making this declaration, I understand that I am allowing the researcher to use the information I am providing her for the purpose of this research and its output and I am also aware that I can withdraw from the research at any time.

I have read the participant information sheet for the above research project and understand the following:

- 1. That I am free to withdraw at any time.
- 2. That all information I provide will be dealt with in a confidential manner.
- 3. I agree that the researcher may contact me.
- 4. I understand that the researcher recognises my rights to confidentiality and anonymity. However, I willingly waive that right and request the researcher to identify me and my organisation with any publication of my inputs.

Organisation	
Name	
Telephone	
Email	
Date	Signature

Researcher:	Date
	Signature

Appendix B5: Tables Related to Data Analysis Stages Applying TA Approach

Table B5.1- Piori Themes*

<p>Contextual information Organisational Background Primary focus of agility programme Understanding and perception of Agility</p> <p>Agility Drivers Customer Requirements Marketplace Competition Basis Technology Social Factors Legal and Ethical Factors</p> <p>Organisational Culture Role of organisational culture Characteristics of agile organisational culture</p> <p>Characteristics of agile people Having Change-Ready Mindset Business-Driven Values-Driven Accountable Having sense of Ownership Generative Empowered Proactive Adaptable & Flexible Responsive Quickness Skilled Innovative</p>	<p>HRM roles in developing agility</p> <p>Characteristics of an agile HR function</p> <p>Agility-oriented HR practices</p> <ol style="list-style-type: none"> 1- Work Design 2- Staffing 3- Talent management 4- Education, Development and Training 5- Performance Management 6- Reward and Recognition 7- Employee Communication 8- Employee/Labour Relations 9- Work Context 10- Employee involvement
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*These priori themes were defined at first stage based on existing literature and preliminary conceptual framework, and structured around the five research questions. The table lists the first level a priori themes and second level a priori subthemes in the context of each of the five research questions.

Table B5.2- Primarily codes derived from sub-set of data (only Council 1) and comparison with the Priori Themes *

Priori Themes* (Prior to Fieldwork)	Primarily Codes: Emergent Themes from Sub-Set of Data
Contextual information	Contextual Factors
Organisational Background	Council 1 before transformation <ul style="list-style-type: none"> • Traditional hierarchal structure • Very Silo • Confederation as opposed to a corporate organisation • Each directorate being separate • Very limited movements of staff across the organisation • Role was quite rigid • Employees were more specialist than generalist • Not very creative • Not very innovative • Not very consultative with the workforce
Understanding and perception of Agility	The Understanding Of Agility Concept <ul style="list-style-type: none"> • Fits with the council’s strategic direction and the main aims of Business Transformation programme • Tendency to confuse two concepts of ‘agility’ and ‘agile working’
Primary focus of agility programme	<ul style="list-style-type: none"> • Business Transformation Programme • Excellence in People Management Programme • Agile Working Programme
Agility Drivers	Agility Drivers for Council 1
Customer Requirements	Changes in customer requirements: <ul style="list-style-type: none"> • The changing needs and wants of communities, families and individuals • Increasing demand for <ul style="list-style-type: none"> ○ quicker delivery time ○ better quality interaction ○ Different channels of access to the services
Marketplace	Changes in the business environment; <ul style="list-style-type: none"> • Global recession and austerity • Pressure to improve performance • Pressure to save money
Social Factors	Changes in social factors; <ul style="list-style-type: none"> • Changes in workforce expectations • Better work-life balance • Increasing demand for different style of work, flexible working /home working • Requirements of the new generation • Environmental pressures for reducing carbon emissions
Technology	Changes in technology; <ul style="list-style-type: none"> • Changed how, when and where people work • Created a virtually borderless workplace Changed the work structures and reporting relationships
Competition Basis	Nothing emerged
Legal and Ethical Factors	Nothing emerged
Organisational Culture	Organisational Culture

Role of organisational culture	A fundamental role
Characteristics of agile organisational culture	<ul style="list-style-type: none"> - New approach to employer-employee relationships - Do not operate by fear - Removal of bureaucracy - Listening to employees - Utilising creativity and ideas of individuals - Managers as coach and facilitator - Great communications and sharing information - Empowering people - Distributed leadership: moving away from hierarchical way of operating - Aligning with vision and strategy - Guiding with shared values and healthy culture - Building “relationship power” and networked teams - Gaining engagement and commitment - Focus on excellent practice - Collaborating and unifying - Fostering interdependence - Respect and leveraging diversity - Continuously learning and innovating - Forming lasting partnerships
Characteristics of agile people	Characteristics of agile people <ul style="list-style-type: none"> - Change-ready - Values-driven - Empowered - Flexible - Collaborative - Multi-skilled
HRM roles in developing agility	The new role of HR following the Excellence in People Management Programme* * Divers for HR change : added pressures from austerity challenge
	<ul style="list-style-type: none"> • Change from being <i>order taker</i> to be a <i>strategic facilitator</i> • Become more business-aligned and strategic in nature • Focusing more on empowering and enabling managers to manage their teams • Supporting the manager in the development of themselves and their team • Providing them with <ul style="list-style-type: none"> - Clear policies, guidance and tools - Manager self-service tools - Timely and accurate HR advice, data and reports
Characteristics of an agile HR function	Characteristics of an agile HR function Transformed the HR function Built agility into the HR operations

	<p>Reengineered HR Model</p> <p>Previous HR model</p> <ul style="list-style-type: none"> • traditional model • lots of duplication of HR function • HR function was very operational and siloed focused <p>New Model: Based on Ulrich's model</p> <ul style="list-style-type: none"> • Changed the structure of HR toward more centralisation • SAP system that supports the centralisation • Several centres of excellence • Business partners • Different layers of HR support: online resources, guidance, and the online learning. <p>Benefits of the new HR Model/structure</p> <ul style="list-style-type: none"> • Has led to strategic and proactive HR approach towards business needs and internal and external environment • Standardisation and automation through SAP system have reduced the wasted time • Centralised HR structure requires far less overhead • Reduction in HR operating costs (measureable advantage) • Led to consistency in the delivery of HR services • Gives opportunity to line managers to make decisions more locally • Gives HR professionals more time to develop leadership skill and managerial competencies in managers • Senior HR professionals now are able to • Spend more time on business-critical issues • Spent less time on administrative activities or giving operational support to line managers • Focus on innovation and creativity
	<p>Built agility into the HR operations by Efficient operational systems</p>
	<p>Agile HR professionals:</p> <ul style="list-style-type: none"> • Talk the language of the business, not the language of HR. • Creative • Intelligent • Willing to learn new things • Knowledgeable about: <ul style="list-style-type: none"> - Business environment - Business strategy - Financial challenges - Political issues - Customers' issues and requirements - Technology - Issues of each business functions - Emergent issues in world of academia - The world of other organisations
<p>Agility-oriented HR practices</p>	<p>HRM interventions and Practices supporting EPM and Restructuring towards agility</p>
<p>1-Work Design 2-Staffing</p>	<p>Work Design and Staffing</p> <ul style="list-style-type: none"> - Create more fluid, mobile and flexible roles at all levels - Introduced more generic job descriptions - Ongoing review of roles: make them broader, less specific, and more generic - Mobility clause: facilitate movement of staff across the organisation, allows people to freely deploy and redeploy roles - Priority Movers Scheme: internal hiring - Workforce Planning: Human Capital Metrics

	<ul style="list-style-type: none"> - Access to workforce data
3-Talent management	<p>Talent management</p> <ul style="list-style-type: none"> - Career Aspirations Scheme - Talent Mobility programs: sharing and releasing talent between business units - Salary incentives - Employer brand - Well-being - Talent retention
4- Education, Development and Training	<p>Learning and Development</p> <ul style="list-style-type: none"> - Develop self-management and self-leadership capabilities - Training for managers to manage remotely - Offer many types of training (formal, informal, social, mobile learning) - Lunch and Learns practice
5-Performance Management	<p>Performance management</p> <ul style="list-style-type: none"> - Performance development review (PDRs) - Provide real-time/regular performance feedback - Review performance more frequently - Performance system is linked to pay and reward and recognition - pay structure that enables progression - Performance expectations reflect desired behaviours
6-Reward and Recognition	Nothing emerged
7-Employee Communication	<ul style="list-style-type: none"> - Listening to employees - Great communications and sharing information - Distributed leadership: moving away from hierarchical way of operating
8-Employee/Labour Relations	<ul style="list-style-type: none"> - New approach to employer-employee relationships - Do not operate by fear - Removal of bureaucracy - Listening to employees - Managers as coach and facilitator - Great communications and sharing information - Empowering people
9-Work Context	<p>Agile Working Framework</p> <p>Different work styles</p> <ul style="list-style-type: none"> • Fixed Space Office Worker • Access Point Worker • Mobile Worker • Field Worker • Home Worker <p>Benefits of agile working</p> <p>Employees:</p> <ul style="list-style-type: none"> - Improved workplaces and work styles - Higher levels of job satisfaction

	<ul style="list-style-type: none"> - Better work-life balance - Improved equality of access to work - Less time travelling to work <p>Business:</p> <ul style="list-style-type: none"> • Lower property operating costs • Enable better use of office space • Enable reduction in property portfolio • Reduce number of workstations • Enhanced recruitment and retention <p>Customer and Community</p> <ul style="list-style-type: none"> • Better customer experience: <ul style="list-style-type: none"> ○ Easier access to services ○ New service delivery options ○ Opportunity for greater customer contacts ○ More productive/responsive service • Greater sustainability <ul style="list-style-type: none"> ○ Reduce employee travel ○ Reduce energy consumption ○ Services delivered locally ○ Lower carbon footprint <p>Requirements for Implementation</p> <ul style="list-style-type: none"> ○ Change in work processes / styles /patterns ○ Shift in organisational culture ○ Change in workplace design/ technology /infrastructures ○ Change in job descriptions/ career model / performance management ○ New HR policies ○ New communication process ○ New leadership style/management approach ○ Autonomy and empowerment ○ Independent decision making ○ Improvement in the employees' technological knowledge /self management skills <p>Mechanisms to support agile working</p> <ul style="list-style-type: none"> ○ Online agile working guidance pack ○ Agile working forum ○ Information packs ○ ICT workshop sessions ○ Agile working surgeries ○ Work style ICT packs ○ Manager workshops ○ Occupier forums and drop-in sessions ○ Building user groups
10-Employee involvement	<ul style="list-style-type: none"> - Promote participative decision-making style - Listening to employees - Utilising creativity and ideas of individuals - Empowering people - Distributed leadership: moving away from hierarchical way of operating - Gaining engagement and commitment - Focus on excellent practice - Collaborating and unifying

	- Forming lasting partnerships
	New Themes: Leadership development Promote participative decision-making style Professional development to manage agile workforce Sessions on performance management process, PDRs, ... Developing managerial competency

* As depicted in the Table B5.2 below, the two-levels a priori themes were further expanded, through emergent themes from the sub-set of data at Council 1. The overall picture of changes is also depicted in the following table to show emergent themes against the priori themes.

Table B5.3- Initial Template

<p>1.Contextual Factors</p> <p>1.1.Organisational Background</p> <p>1.2.Focus Of Agility Programme</p> <p>1.3. The Understanding Of Agility Concept</p> <p>2. Agility Drivers</p> <p>2.1. Business environment</p> <p>2.1.1 Global recession and austerity</p> <p>2.1.2. Economical Pressure</p> <p>2.1.3. Customer requirements</p> <p>2.2. Changing needs</p> <p>2.2.1.quicker delivery time</p> <p>2.2.2.better quality interaction</p> <p>2.2.3.Different channels of access to the services</p> <p>2.3.Social factors</p> <p>2.3.1.changes in workforce expectations</p> <p>2.3.2. better work-life balance</p> <p>2.3.3.different flexible working /home working</p> <p>2.3.4.requirements of the new generation</p> <p>2.3.5.reducing carbon emissions</p> <p>2.4.Changes in technology;</p> <p>2.4.1.changed how, when and where people work</p> <p>2.4.2.virtually borderless workplace</p> <p>2.4.3.New work structures</p> <p>3. Organisational culture</p> <p>3.1.Role of organisational culture</p> <p>3.2. Characteristics of organisational culture critical for agility</p> <p>3.2.1.employer-employee relationships</p> <p>do not operate by fear</p> <p>listening to employees</p> <p>Empowering people</p> <p>Managers as coach and facilitator</p> <p>Respect and leveraging diversity</p> <p>Fostering interdependence</p> <p>3.2.2.Power sharing</p> <p>3.2.2.1. removal of bureaucracy</p> <p>3.2.2.2.Distributed leadership: moving away from hierarchical way of operating</p> <p>3.2.2.3.Utilising creativity and ideas of individuals</p> <p>3.2.2.4. Building “relationship power” and networked teams</p> <p>3.2.3.Shared values</p> <p>3.2.3.1.Aligning with vision and strategy</p> <p>3.2.3.2.Continuous learning and innovating</p> <p>3.2.3.3.Engagement and Commitment</p> <p>3.2.3.4.Collaboration</p> <p>3.2.3.5.Open Communications</p> <p>3.2.3.6.Sharing information</p> <p>3.2.3.7.Focus on Excellent practice</p> <p>4.Agile people attributes</p> <p>4.1.Mindset</p> <p>4.2.Behaviours</p> <p>5.HRM roles in achieving agility</p> <p>5.1. Strategic facilitator</p> <p>5.2.Business-aligned and strategic</p> <p>5.3.Empowering and enabling managers</p>
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- 5.4. Management and leadership development
- 5.5. Efficient operational systems
- 5.6. Clear policies, guidance and tools
- 5.7. Manager self-service tools
- 5.8. Timely and accurate hr advice, data and reports

6. Characteristics of an Agile HR function

6.1. Transformed HR function roles

6.2. Agile HR professionals

- 6.2.1. Knowledgeable about
 - 6.2.1.1. Business environment
 - 6.2.1.2. Business strategy
 - 6.2.1.3. Financial challenges
 - 6.2.1.4. Political issues
 - 6.2.1.5. Customers' issues and requirements
 - 6.2.1.6. Technology
 - 6.2.1.7. Issues of each business functions
 - 6.2.1.8. Emergent issues in world of academia
 - 6.2.1.9. The world of other organisations
- 6.2.2. Talk the language of the business, not the language of HR.
- 6.2.3. Creative
- 6.2.4. Intelligent
- 6.2.5. Willing to learn new things

6.3. Re-structured HR model

- 6.3.1. Change the structure of HR toward more centralisation
- 6.3.2. SAP system that supports the centralisation
- 6.3.3. Several centres of excellence
- 6.3.4. Different layers of HR support: online resources, guidance
- 6.3.5. Business partners : Based on **Ulrich's model**
 - 6.3.5.1. Benefits of the Business partnering Model
 - Led to strategic HR approach towards business needs
 - HR professionals are able to
 - Spend more time on business critical issues
 - Spent less time on administrative activities
 - Focus on innovation and creativity
 - Spend more time on developing managers
 - Standardisation and automation through SAP system have reduced the wasted time
 - Far less overhead
 - Reduction in HR operating costs (measureable advantage)
 - Consistency in the delivery of HR services
 - Local decision making by line mangers

6.4. Efficient operational systems

7. Effective HRM Practices in achieving agility

7.1. Staffing

- 7.1.1. Priority Movers Scheme: internal hiring
- 7.1.2. Workforce Planning: Human Capital Metrics
- 7.1.3. Access to workforce data

7.2. Performance management

- 7.2.1. Performance expectations reflect desired behaviours
- 7.2.2. Provide real-time/regular performance feedback
- 7.2.3. Review performance more frequently
- 7.2.4. linked to pay /reward and recognition
- 7.2.5. pay structure that enables progression

7.3. Talent management

- 7.3.1. Career Aspirations Scheme
- 7.3.2. Talent Mobility programs
- 7.3.3. Salary incentives
- 7.3.4. Employer brand
- 7.3.5. Well-being
- 7.3.6. Talent retention

7.4. Learning and Development

- 7.4.1. Develop self-management and self-leadership capabilities
- 7.4.2. Training for managers to manage remotely
- 7.4.3. Offer many types of training (formal, informal, social, mobile learning)
- 7.4.4. Lunch and Learns practice

7.5. Leadership development

- 7.5.1. Promote participative decision making style
- 7.5.2. Professional development to manage agile workforce
- 7.5.3. Sessions on performance management process, PDRs, ...
- 7.5.6. Developing managerial competency

7.6. Work Design

- 7.6.1. fluid, mobile and flexible roles
- 7.6.2. broader, less specific, and more generic roles
- 7.6.3. more generic job descriptions
- 7.6.4. Ongoing review of roles
- 7.6.5. Mobility: movement of staff across the organisation
- 7.6.6. freely deploy and redeploy roles

7.7 Agile Working Framework

7.7.1. Different work styles

Fixed Space Office Worker
Access Point Worker
Mobile Worker
Field Worker
Home Worker

7.7.2. Benefits of agile working

Employees:

Improved workplaces and work styles
Higher levels of job satisfaction
Better work-life balance
Improved equality of access to work
Less time travelling to work

Business:

Lower property operating costs
Enable better use of office space
Enable reduction in property portfolio
Reduce number of workstations
Enhanced recruitment and retention

Customer and Community

Better customer experience:

Easier access to services
New service delivery options
Opportunity for greater customer contacts
More productive/responsive service
Greater sustainability

Reduce employee travel
Reduce energy consumption
Services delivered locally
Lower carbon footprint

7.7.3. Requirements for Implementation

Change in work processes / styles / patterns
Shift in organisational culture
Change in workplace design/ technology /infrastructures
Change in job descriptions/ career model / performance management
New HR policies
New communication process
New leadership style/management approach
Autonomy and empowerment
Independent decision making
Improvement in the employees' technological knowledge /self management skills

7.7.4. Mechanisms to support agile working

Online agile working guidance pack
Agile working forum
Information packs
ICT workshop sessions
Agile working surgeries
Work style ICT packs
Manager workshops
Occupier forums and drop-in sessions
Building user groups

7.8. Reward and Recognition

7.9. Employee Communication

7.10. Employee/Labour Relations

7.11. Employee involvement

Table B5.4- The Final Template

<p>1.Contextual Factors</p> <p>1.1 Organisational Background</p> <p>1.2 Perceptions of agility</p> <p>2. Agility Drivers</p> <p>2.1. Business environment</p> <ul style="list-style-type: none">• Global recession and austerity• Economical pressure• Customer requirements• Declining prices and in some markets declining revenues• Market and product convergenc <p>2.2. Changing customer's expectations</p> <ul style="list-style-type: none">• Quicker delivery time• Better quality interaction• Different channels of access to the services <p>2.3. Social factors</p> <ul style="list-style-type: none">• Changes in workforce expectations• Better work-life balance• Different flexible working /home working• Requirements of the new generation• Reducing carbon emissions <p>2.4. Changes in technology;</p> <ul style="list-style-type: none">• Changed how, when and where people work• Virtually borderless workplace• New work structures <p>2.5.Competition basis;</p> <ul style="list-style-type: none">• Strong and new competition• Regulatory intervention to promote competition and reduce wholesale prices. <p>2.6.Legal and Ethical Factors</p> <ul style="list-style-type: none">• Regulatory intervention to promote competition and reduce wholesale prices. <p>3. Organisational culture</p> <p>3.1.Role of organisational culture</p> <p>3.2. Characteristics of Agile Organisational Culture</p> <ul style="list-style-type: none">• Accountability• Trust• Open communication environment• Recognising the contribution of people• Desire to continuously improve• Collaboration• Being change ready and responsive• Leading by example• Openness and honesty• Customer focus• Flexibility• Teamwork• Risk-taking• Creativity• Fairness• Diversity• Integrity

- Fast response
- Thinking long term
- Being innovative
- Empowerment

4. Agile people attributes

4.1. AO Mindsets

- Change-ready
- Business-driven
- Customer-Focused
- Being strategic
- Values-driven
- Accountability
- Empowered

4.2. AO Behaviours

- Flexible
- Intelligence
- Quick
- Collaborative
- Innovative
- Proactive
- Resilient
- Generative

4.3 Being multi-skilled: Having transferable balanced skill-set

5. HRM roles in achieving agility

Being Strategic business partner

- Co-crafting and implementation of the firm's overall strategies
- Crafting an agility-oriented HR strategy and designing a highly dynamic and a supportive HR system

Developing 'workforce agility capabilities'

- Developing a human capital pool
- Promoting agility-oriented mindset and behaviours

Fostering Agile Culture

- Shared mind-set and a common set of values
- Training leadership and management about values
- Putting values at the heart of all HR principles and practices
- Adopting specific AOHR practices which promote agile
- Maintaining the established agile culture
- Making sure that the new leaders understand what the agile culture

Creating Environment Which Facilitate Agility Development

- Developing leadership:
- Aligning organisational infrastructures with agility
- Less hierarchical structures to fluid, flat structure
- 'Semi-autonomous' / 'self-directed' teams
- Open communication:
- Knowledge/information sharing
- Utilising an adaptable workplace design

Creating an Agile HR Function

6. Characteristics of an agile HR function

Highly capable HR professionals with agile attributes

- Knowledgeable about
- Business environment
- Business strategy
- Financial challenges
- Political issues
- Customers' issues and requirements
- Technology
- Emergent issues in world of academia
- Talk the language of the business, not the language of HR.
- Creative
- Intelligent
- Willing to learn new things

Agile and flexible HR structures and work models

- Change the structure of HR toward more centralisation
- Several centres of excellence
- Business partners: Based on Ulrich's model

Agile HR processes and operational system and efficient HR technologies

- Different layers of HR support: online resources, guidance
- SAP system that supports the centralisation
- HR self- service technologies
- Analytic

7. AOHRM Practices

7.1. Staffing

- Search for people with agile attributes
- Hire for attitude first
- Competency-based interviews
- Priority movers scheme: internal hiring
- Workforce planning: human capital metrics
- Access to workforce data
- Broader recruiting sources
- Continuous recruiting

7.2. Performance management

- Performance expectations reflect desired behaviours
- Provide real-time/regular performance feedback
- Review performance more frequently
- Linked to pay /reward and recognition
- Pay structure that enables progression
- Include some measures that relate to agility
- Goal-setting and performance measurement/review are about KPIs and behaviours
- Goal-setting: common performance metrics
- Goal-setting focus on individual contributions
- Emphasizes contributions in outputs rather than tasks and presenteeism
- Continuous performance appraisal and employee feedback
- Linked to talent management and L&D
- Linked to pay and reward and recognition
- Encourages for positive peer review: in some cases, 360-degree reviews

7.3. Talent management

- Employment branding
- Broader recruiting sources / social media
- Developing their own talent pipelines
- Continuous recruiting
- Utilising a range of employee retention programmes
- Career aspirations scheme
- Talent mobility programs
- Salary incentives
- Employer brand
- Well-being

7.4. Learning and Development

- L&D strategy are aligned to strategic direction, business plan, workforce plan, the vision, values, and desired behaviours and outcomes
- Both proactive and reactive approaches
- Build a strong learning culture that supports ongoing learning
- Include all categories of employees
- Continuous skills and capability development, and continuing progress in their careers.
- Linked with performance management and talent management
- Employees have ultimate responsibility for their development
- Employees are encouraged to learn multiple competencies and to educate their colleagues by actively sharing information and knowledge.
- Online e-learning portal, access to extensive learning resources and online/offline training programmes
- Employees are encouraged to work towards membership of professional bodies
- Focus on developing agile attributes
- L&D programmes embed core values and desired behaviours and outcomes and common performance metrics
- Focused on innovation, increasing customer satisfaction
- Include the foundations of:
 - Managing change
 - Systematic approach to solving problems
 - Questioning techniques and sharing innovative ideas
 - Self-management and self-leadership capabilities
 - Provide professional development to managers

7.5. Work Design

- Fluid, mobile and flexible roles
- Broader, less specific, and more generic roles
- More generic job descriptions
- Ongoing review of roles
- Mobility: movement of staff across the organisation
- Freely deploy and redeploy roles
- Agile working framework

7.6. Reward and Recognition

- Continuous rewards and recognition
- Embed AO behaviours
- Linked with performance and behaviours, management, L&D and talent management

- Traditional monetary rewards and benefits:
- Competitive salaries, holiday entitlement, pension scheme, tax-and NIC-advantageous, childcare vouchers
- Discounts on company's products
- Discounted prices or cash back at featured retailers
- Retirement Plan
- Profit sharing
- Non-monetary incentives or recognition:
- Gifts, celebrations, dinners.
- On-the-spot recognition
- Team-based rewards system
- Focus on social responsibility
- Flexible working
- Benefits reflect the full value of employees' skills, experience and qualifications.
- Social rewards and recognition tools
- Establish thank you system
- L&d opportunities
- Career progression opportunities: promote employee mobility

7.7. Employee Communication

- Business status (both positive and negative issues)
- Shared values, business plans and objectives, common performance metrics
- Create a climate of open and two-way communication
- Channels of bottom-up communications.
Channels of top-down, side-to-side and inside-out communication
- Employees are encouraged to have social interactions
- Employ a wide range of communication mechanisms

7.8. Employee involvement

- Employee forums
- Consultation and engagement activities
- employee opinion surveys, people insights team, employer listening team, quality of working life committees
- Suggestion scheme
- Ideas sessions
- Motivation: personal satisfaction, self-actualisation and empowerment

7.9 Empowerment

- Delegates more decision-making to individuals and teams
- No micro managing
- Distribute authority and power based on expertise rather than hierarchical position.
- Give autonomy
- Create a climate of trust and interdependence and reinforce organisational citizenship and personal accountability.
- Promote empowerment by training sessions and coaching development programmes to develop self-management and self-leadership capabilities.

- Performance management frameworks support empowerment principles by providing people with the freedom for experimentation

Table B5.5- Modifications from Primarily Codes to Initial Template

Prior Themes* (prior to fieldwork)	Primarily codes: Emergent themes from sub-set of data	Initial template: Modified the Primarily codes
Contextual information	Contextual Factors	1.Contextual Factors
Organisational Background	Council 1 before transformation <ul style="list-style-type: none"> • Traditional hierarchal structure • Very Silo • Confederation as opposed to a corporate organisation • Each directorate being separate • Very limited movements of staff across the organisation • Role was quite rigid • Employees were more specialist than generalist • Not very creative • Not very innovative • Not very consultative with the workforce 	1.1.Organisational Background
Understanding and perception of Agility	The Understanding Of Agility Concept <ul style="list-style-type: none"> • Fits with the council’s strategic direction and the main aims of Business Transformation programme • Tendency to confuse two concepts of ‘agility’ and ‘agile working’ 	1.3. The Understanding Of Agility Concept
Primary focus of agility programme	<ul style="list-style-type: none"> • Business Transformation Programme • Excellence in People Management Programme • Agile Working Programme 	1.2.Focus Of Agility Programme
Agility Drivers	Agility Drivers for Council 1	2. Agility Drivers
Customer Requirements	Changes in customer requirements: <ul style="list-style-type: none"> • The changing needs and wants of communities, families and individuals • Increasing demand for <ul style="list-style-type: none"> ○ quicker delivery time ○ better quality interaction 	2.2. Changing needs <ul style="list-style-type: none"> 2.2.1.quicker delivery time 2.2.2.better quality interaction 2.2.3.Different channels of access to the services

	<ul style="list-style-type: none"> ○ Different channels of access to the services 	
Marketplace	<p>Changes in the business environment;</p> <ul style="list-style-type: none"> ● Global recession and austerity ● Pressure to improve performance ● Pressure to save money 	<p>2.1. Business environment</p> <p>2.1.1 Global recession and austerity 2.1.2. Economical Pressure 2.1.3. Customer requirements</p>
Social Factors	<p>Changes in social factors;</p> <ul style="list-style-type: none"> ● Changes in workforce expectations ● Better work-life balance ● Increasing demand for different style of work, flexible working /home working ● Requirements of the new generation ● Environmental pressures for reducing carbon emissions 	<p>2.3.Social factors</p> <p>2.3.1.changes in workforce expectations 2.3.2. better work-life balance 2.3.3.different flexible working /home working 2.3.4.requirements of the new generation 2.3.5.reducing carbon emissions</p>
Technology	<p>Changes in technology;</p> <ul style="list-style-type: none"> ● Changed how, when and where people work ● Created a virtually borderless workplace <p>Changed the work structures and reporting relationships</p>	<p>2.4.Changes in technology;</p> <p>2.4.4.changed how, when and where people work 2.4.2.virtually borderless workplace 2.4.3.New work structures</p>
Competition Basis	Nothing emerged	
Legal and Ethical Factors	Nothing emerged	
Organisational Culture	Organisational Culture	3. Organisational culture
Role of organisational culture	<p>Role of organisational culture</p> <p>A fundamental role</p>	<p>3.1.Role of organisational culture</p> <p>A fundamental role</p>
Characteristics of agile organisational culture	<ul style="list-style-type: none"> - New approach to employer-employee relationships - Do not operate by fear - Removal of bureaucracy - Listening to employees - Utilising creativity and ideas of individuals - Managers as coach and facilitator - Great communications and sharing information - Empowering people - Distributed leadership: moving away from hierarchical 	<p>3.2. Characteristics of organisational culture critical for agility</p> <p>3.2.1.Employer-employee relationships</p> <p>3.2.1.7. Do not operate by fear 3.2.1.8. Listening to employees 3.2.1.9. Empowering people 3.2.1.10.Managers as coach and facilitator 3.2.1.11.Respect and leveraging diversity 3.2.1.12.Fostering interdependence</p> <p>3.2.2.Power sharing</p> <p>3.2.2.1. Removal of bureaucracy 3.2.2.2.distributed leadership: moving away from</p>

	<p>way of operating</p> <ul style="list-style-type: none"> - Aligning with vision and strategy - Guiding with shared values and healthy culture - Building “relationship power” and networked teams - Gaining engagement and commitment - Focus on excellent practice - Collaborating and unifying - Fostering interdependence - Respect and leveraging diversity - Continuously learning and innovating - Forming lasting partnerships 	<p>hierarchical way of operating</p> <p>3.2.2.3.utilising creativity and ideas of individuals</p> <p>3.2.2.4. Building “relationship power” and networked teams</p> <p>3.2.3.Shared values</p> <p>3.2.3.1.Aligning with vision and strategy</p> <p>3.2.3.2.Continuous learning and innovating</p> <p>3.2.3.3.Engagement and Commitment</p> <p>3.2.3.4.Collaboration</p> <p>3.2.3.5.Open Communications</p> <p>3.2.3.6.Sharing information</p> <p>3.2.3.7.Focus on Excellent practice</p>
Characteristics of agile people	<ul style="list-style-type: none"> - Change-ready - Values-driven - Empowered - Flexible - Collaborative - Multi-skilled 	<p>4.Agile people attributes</p> <p>4.1.Mindset</p> <ul style="list-style-type: none"> - Change-ready - Values-driven - Empowered <p>4.2.Behaviours</p> <ul style="list-style-type: none"> - Flexible - Collaborative - Multi-skilled
HRM roles in developing agility	<p>The new role of HR following the Excellence in People Management Programme*</p> <p>* Divers for HR change : added pressures from austerity challenge</p>	5.HRM roles in achieving agility

	<ul style="list-style-type: none"> • Change from being <i>order taker</i> to be a <i>strategic facilitator</i> • Become more business-aligned and strategic in nature • Focusing more on empowering and enabling managers to manage their teams • Supporting the manager in the development of themselves and their team • Providing them with <ul style="list-style-type: none"> - Clear policies, guidance and tools - Manager self-service tools - Timely and accurate HR advice, data and reports 	5.1. Strategic facilitator 5.2. Business-aligned and strategic 5.3. Empowering and enabling managers 5.4. Management and leadership development 5.8. Provide timely and accurate HR advice, data and reports 5.5. Provide Efficient operational systems 5.6. Provide Clear policies, guidance and tools 5.7. Provide Manager self-service tools
Characteristics of an agile HR function	Characteristics of an agile HR function Transformed the HR function Built agility into the HR operations	6. Characteristics of an Agile HR function
	Reengineered HR Model Previous HR model <ul style="list-style-type: none"> • traditional model • lots of duplication of HR function • HR function was very operational and siloed focused New Model: Based on Ulrich's model <ul style="list-style-type: none"> • Changed the structure of HR toward more centralisation • SAP system that supports the centralisation • Several centres of excellence • Business partners • Different layers of HR support: online resources, guidance, and the online learning. Benefits of the new HR Model/structure <ul style="list-style-type: none"> • Has led to strategic and proactive HR approach towards business needs and internal and external environment • Standardisation and automation through SAP system have reduced the wasted time • Centralised HR structure requires far less overhead • Reduction in HR operating costs (measureable advantage) • Led to consistency in the delivery of HR services • Gives opportunity to line managers to make decisions more locally 	6.1. Transformed HR function roles 6.3. Re-structured HR model 6.3.1. Change the structure of HR toward more centralisation 6.3.2. SAP system that supports the centralisation 6.3.3. Several centres of excellence 6.3.4. Different layers of HR support: <u>online resources, guidance</u> 6.3.5. Business partners : Based on Ulrich's model <ul style="list-style-type: none"> 6.3.5.1. Benefits of the Business partnering Model <ul style="list-style-type: none"> • Led to strategic HR approach towards business needs • Standardisation and automation through SAP system have reduced the wasted time • Far less overhead • Reduction in HR operating costs (measureable advantage) • Consistency in the delivery of HR services • Local decision making by line managers • HR professionals are able to <ul style="list-style-type: none"> • Spend more time on business critical issues • Spent less time on administrative activities • Focus on innovation and creativity • Spend more time on developing managers

	<ul style="list-style-type: none"> • Gives HR professionals more time to develop leadership skill and managerial competencies in managers • Senior HR professionals now are able to • Spend more time on business-critical issues • Spent less time on administrative activities or giving operational support to line managers • Focus on innovation and creativity 	
	Built agility into the HR operations by Efficient operational systems	6.4. Efficient operational systems
	<p>Agile HR professionals:</p> <ul style="list-style-type: none"> • Talk the language of the business, not the language of HR. • Creative • Intelligent • Willing to learn new things • Knowledgeable about: <ul style="list-style-type: none"> - Business environment - Business strategy - Financial challenges - Political issues - Customers' issues and requirements - Technology - Issues of each business functions - Emergent issues in world of academia - The world of other organisations 	<p>6.2. Agile HR professionals</p> <p>6.2.1. Knowledgeable about</p> <p>6.2.1.1. Business environment</p> <p>6.2.1.2. Business strategy</p> <p>6.2.1.3. Financial challenges</p> <p>6.2.1.4. Political issues</p> <p>6.2.1.5. Customers' issues and requirements</p> <p>6.2.1.6. Technology</p> <p>6.2.1.7. Issues of each business functions</p> <p>6.2.1.8. Emergent issues in world of academia</p> <p>6.2.1.9. The world of other organisations</p> <p>6.2.2. Talk the language of the business, not the language of HR.</p> <p>6.2.3. Creative</p> <p>6.2.4. Intelligent</p> <p>6.2.5. Willing to learn new things</p>
Agility-oriented HR practices	HRM interventions and Practices supporting EPM and Restructuring towards agility	7. Effective HRM Practices in achieving agility
1-Work Design 2-Staffing	<p>Work Design and Staffing</p> <ul style="list-style-type: none"> - Create more fluid, mobile and flexible roles at all levels - Introduced more generic job descriptions - Ongoing review of roles: make them broader, less specific, 	<p>7.1. Staffing</p> <p>7.1.1. Priority Movers Scheme: internal hiring</p> <p>7.1.2. Workforce Planning: Human Capital Metrics</p> <p>7.1.3. Access to workforce data</p>

	<p>and more generic</p> <ul style="list-style-type: none"> - Mobility clause: facilitate movement of staff across the organisation, allows people to freely deploy and redeploy roles - Priority Movers Scheme: internal hiring - Workforce Planning: Human Capital Metrics - Access to workforce data 	<p>7.6. Work Design</p> <ul style="list-style-type: none"> 7.6.1.fluid, mobile and flexible roles 7.6.2.broader, less specific, and more generic roles 7.6.3.more generic job descriptions 7.6.4.Ongoing review of roles 7.6.5.Mobility: movement of staff across the organisation 7.6.6.freely deploy and redeploy roles
3-Talent management	<p>Talent management</p> <ul style="list-style-type: none"> - Career Aspirations Scheme - Talent Mobility programs: sharing and releasing talent between business units - Salary incentives - Employer brand - Well-being - Talent retention 	<p>7.3. Talent management</p> <ul style="list-style-type: none"> 7.3.1.Career Aspirations Scheme 7.3.2.Talent Mobility programs 7.3.3.Salary incentives 7.3.4.Employer brand 7.3.5.Well-being 7.3.6.Talent retention
4- Education, Development and Training	<p>Learning and Development</p> <ul style="list-style-type: none"> - Develop self-management and self-leadership capabilities - Training for managers to manage remotely - Offer many types of training (formal, informal, social, mobile learning) - Lunch and Learns practice 	<p>7.4. Learning and Development</p> <ul style="list-style-type: none"> 7.4.1.Develop self-management and self-leadership capabilities 7.4.2.Training for managers to manage remotely 7.4.3.Offer many types of training (formal, informal, social, mobile learning) 7.4.4.Lunch and Learns practice
5-Performance Management	<p>Performance management</p> <ul style="list-style-type: none"> - Performance development review (PDRs) - Provide real-time/regular performance feedback - Review performance more frequently - Performance system is linked to pay and reward and recognition - pay structure that enables progression - Performance expectations reflect desired behaviours 	<p>7.2. Performance management</p> <ul style="list-style-type: none"> 7.2.1.Performance expectations reflect desired behaviours 7.2.2.Provide real-time/regular performance feedback 7.2.3.Review performance more frequently 7.2.4.linked to pay /reward and recognition 7.2.5. pay structure that enables progression

6-Reward and Recognition	Nothing emerged	7.8. Reward and Recognition
7-Employee Communication	<ul style="list-style-type: none"> - Listening to employees - Great communications and sharing information - Distributed leadership: moving away from hierarchical way of operating 	7.9. Employee Communication
8-Employee/Labour Relations	<ul style="list-style-type: none"> - New approach to employer-employee relationships - Do not operate by fear - Removal of bureaucracy - Listening to employees - Managers as coach and facilitator - Great communications and sharing information - Empowering people 	7.10. Employee/Labour Relations
9-Work Context	<p>Agile Working Framework Different work styles</p> <ul style="list-style-type: none"> • Fixed Space Office Worker • Access Point Worker • Mobile Worker • Field Worker • Home Worker <p>Benefits of agile working Employees:</p> <ul style="list-style-type: none"> - Improved workplaces and work styles - Higher levels of job satisfaction - Better work-life balance - Improved equality of access to work - Less time travelling to work <p>Business:</p> <ul style="list-style-type: none"> • Lower property operating costs • Enable better use of office space • Enable reduction in property portfolio 	<p>7.7 Agile Working Framework 7.7.1. Different work styles</p> <ul style="list-style-type: none"> • Fixed Space Office Worker • Access Point Worker • Mobile Worker • Field Worker • Home Worker <p>7.7.2. Benefits of agile working Employees:</p> <ul style="list-style-type: none"> • Improved workplaces and work styles • Higher levels of job satisfaction • Better work-life balance • Improved equality of access to work • Less time travelling to work <p>Business:</p> <ul style="list-style-type: none"> • Lower property operating costs • Enable better use of office space • Enable reduction in property portfolio

	<ul style="list-style-type: none"> • Reduce number of workstations • Enhanced recruitment and retention <p>Customer and Community</p> <ul style="list-style-type: none"> • Better customer experience: <ul style="list-style-type: none"> ○ Easier access to services ○ New service delivery options ○ Opportunity for greater customer contacts ○ More productive/responsive service • Greater sustainability <ul style="list-style-type: none"> ○ Reduce employee travel ○ Reduce energy consumption ○ Services delivered locally ○ Lower carbon footprint <p>Requirements for Implementation</p> <ul style="list-style-type: none"> ○ Change in work processes / styles /patterns ○ Shift in organisational culture ○ Change in workplace design/ technology /infrastructures ○ Change in job descriptions/ career model / performance management ○ New HR policies ○ New communication process ○ New leadership style/management approach ○ Autonomy and empowerment ○ Independent decision making ○ Improvement in the employees' technological knowledge /self management skills <p>Mechanisms to support agile working</p> <ul style="list-style-type: none"> ○ Online agile working guidance pack ○ Agile working forum ○ Information packs ○ ICT workshop sessions ○ Agile working surgeries ○ Work style ICT packs ○ Manager workshops 	<ul style="list-style-type: none"> • Reduce number of workstations • Enhanced recruitment and retention <p>Customer and Community</p> <ul style="list-style-type: none"> • Better customer experience: <ul style="list-style-type: none"> • Easier access to services • New service delivery options • Opportunity for greater customer contacts • More productive/responsive service • Greater sustainability <ul style="list-style-type: none"> • Reduce employee travel • Reduce energy consumption • Services delivered locally • Lower carbon footprint <p>7.7.3.Requirements for Implementation</p> <ul style="list-style-type: none"> • Change in work processes / styles /patterns • Shift in organisational culture • Change in workplace design/ technology /infrastructures • Change in job descriptions/ career model / performance management • New HR policies • New communication process • New leadership style/management approach • Autonomy and empowerment • Independent decision making • Improvement in the employees' technological knowledge /self management skills <p>7.7.4. Mechanisms to support agile working</p> <ul style="list-style-type: none"> • Online agile working guidance pack • Agile working forum • Information packs • ICT workshop sessions • Agile working surgeries • Work style ICT packs
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	<ul style="list-style-type: none"> ○ Occupier forums and drop-in sessions ○ Building user groups 	<ul style="list-style-type: none"> ● Manager workshops ● Occupier forums and drop-in sessions ● Building user groups
10-Employee involvement	<ul style="list-style-type: none"> - Promote participative decision-making style - Listening to employees - Utilising creativity and ideas of individuals - Empowering people - Distributed leadership: moving away from hierarchical way of operating - Gaining engagement and commitment - Focus on excellent practice - Collaborating and unifying - Forming lasting partnerships 	7.11. Employee involvement
	<p>New Themes: Leadership development Promote participative decision-making style Professional development to manage agile workforce Sessions on performance management process, PDRs, ... Developing managerial competency</p>	<p>7.5. Leadership development 7.5.1.Promote participative decision making style 7.5.2.Professional development to manage agile workforce 7.5.3.Sessions on performance management process, PDRs, ... 7.5.6.Developing managerial competency</p>

Table B5.6- Modifications from Initial Template to The Final Template

Priori Themes* (prior to fieldwork)	Initial template	Final Template
Contextual information	1.Contextual Factors	1.Contextual Factors
Organisational Background	1.1.Organisational Background	1.1 Organisational Background
Understanding and perception of Agility	1.3. The Understanding Of Agility Concept	1.2 Perceptions of agility
Primary focus of agility programme	1.2.Focus Of Agility Programme	
Agility Drivers	2. Agility Drivers	2. Agility Drivers
Customer Requirements	2.2. Changing needs 2.2.1.quicker delivery time 2.2.2.better quality interaction 2.2.3.Different channels of access to the services	2.2. Changing customer’s expectations <ul style="list-style-type: none"> • Quicker delivery time • Better quality interaction • Different channels of access to the services
Marketplace	2.1. Business environment 2.1.1 Global recession and austerity 2.1.2. Economical Pressure 2.1.3. Customer requirements	2.1. Business environment <ul style="list-style-type: none"> • Global recession and austerity • Economical pressure • Customer requirements • Declining prices and in some markets declining revenues • Market and product convergence
Social Factors	2.3.Social factors 2.3.1.changes in workforce expectations 2.3.2. better work-life balance 2.3.3.different flexible working /home working 2.3.4.requirements of the new generation 2.3.5.reducing carbon emissions	2.3. Social factors <ul style="list-style-type: none"> • Changes in workforce expectations • Better work-life balance • Different flexible working /home working • Requirements of the new generation • Reducing carbon emissions
Technology	2.4.Changes in technology; 2.4.4.changed how, when and where people work 2.4.2.virtually borderless workplace 2.4.3.New work structures	2.4. Changes in technology; <ul style="list-style-type: none"> • Changed how, when and where people work • Virtually borderless workplace • New work structures

		<ul style="list-style-type: none"> • Technology substitution
Competition Basis		<ul style="list-style-type: none"> • <i>Strong and new competition</i> • <i>Regulatory intervention to promote competition and reduce wholesale prices.</i> • <i>Intense competition for introduction of new innovative products in a shorter cycle time and launch to market.</i> • <i>Changes in competition criteria</i> • <i>Competition is on time, cost and innovation</i>
Legal and Ethical Factors		<ul style="list-style-type: none"> • <i>Regulatory intervention to promote competition and reduce wholesale prices.</i> • <i>range of social, environmental and legal pressures such as limiting their impact on the planet</i>
Organisational Culture	3. Organisational culture	3. Organisational culture
Role of organisational culture	3.1.Role of organisational culture A fundamental role	3.1.Role of organisational culture A fundamental role
Characteristics of agile organisational culture	3.2. Characteristics of organisational culture critical for agility 3.2.1.Employer-employee relationships 3.2.1.13.Do not operate by fear 3.2.1.14.Listening to employees 3.2.1.15.Empowering people 3.2.1.16.Managers as coach and facilitator 3.2.1.17.Respect and leveraging diversity 3.2.1.18.Fostering interdependence 3.2.2.Power sharing 3.2.2.1. Removal of bureaucracy 3.2.2.2.distributed leadership: moving away from hierarchical way of operating 3.2.2.3.utilising creativity and ideas of individuals 3.2.2.4. Building “relationship power” and networked	3.2. Characteristics of organisational culture <ul style="list-style-type: none"> • Accountability • <i>Trust</i> • Open communication environment • <i>Recognising the contribution of people</i> • Desire to continuously improve • Collaboration • <i>Being change ready and responsive</i> • Leading by example • Openness and honesty • <i>Customer focus</i> • <i>Flexibility</i> • Teamwork

	<p>teams</p> <p>3.2.3.Shared values</p> <p>3.2.3.1.Aligning with vision and strategy</p> <p>3.2.3.2.Continuous learning and innovating</p> <p>3.2.3.3.Engagement and Commitment</p> <p>3.2.3.4.Collaboration</p> <p>3.2.3.5.Open Communications</p> <p>3.2.3.6.Sharing information</p> <p>3.2.3.7.Focus on Excellent practice</p>	<ul style="list-style-type: none"> • <i>Risk-taking</i> • <i>Creativity</i> • <i>Fairness</i> • <i>Diversity</i> • <i>Integrity</i> • <i>Fast response</i> • <i>Thinking long term</i> • <i>Being innovative</i> • <i>Empowerment</i>
Characteristics of agile people	<p>4.Agile people attributes</p> <p>4.1.Mindset</p> <ul style="list-style-type: none"> - Change-ready - Values-driven - Empowered <p>4.2.Behaviours</p> <ul style="list-style-type: none"> - Flexible - Collaborative - Multi-skilled 	<p>4.Agile people attributes</p> <p>4.1.AO Mindsets</p> <ul style="list-style-type: none"> • <i>Change-ready</i> • <i>Business-driven</i> • <i>Customer-Focused</i> • <i>Being strategic</i> • <i>Values-driven</i> • <i>Accountability</i> • <i>Empowered</i> <p>4.2.AO Behaviours</p> <ul style="list-style-type: none"> • <i>Flexible</i> • <i>Intelligence</i> • <i>Quick</i> • <i>Collaborative</i> • <i>Innovative</i> • <i>Proactive</i> • <i>Resilient</i> • <i>Generative</i> <p>4.3 Being multi-skilled: Having transferable balanced skill-set</p>
HRM roles in developing agility	5.HRM roles in achieving agility	5.HRM roles in achieving agility

	Strategic facilitator Business-aligned and strategic	Being Strategic business partner <ul style="list-style-type: none"> • <i>Co-crafting and implementation of the firm's overall strategies</i> • <i>Crafting an agility-oriented HR strategy and designing a highly dynamic and a supportive HR system</i>
		<i>Developing 'workforce agility capabilities'</i> <ul style="list-style-type: none"> • <i>Developing a human capital pool</i> • <i>Promoting agility-oriented mindset and behaviours</i>
		<i>Fostering Agile Culture</i> <ul style="list-style-type: none"> • <i>Shared mind-set and a common set of values</i> • <i>Training leadership and management about values</i> • <i>Putting values at the heart of all HR principles and practices</i> • <i>Adopting specific AOHR practices which promote agile</i> • <i>Maintaining the established agile culture</i> • <i>Making sure that the new leaders understand what the agile culture</i>
	Empowering and enabling managers Management and leadership development	<i>Creating Environment Which Facilitate Agility Development</i> <ul style="list-style-type: none"> • <i>Developing leadership:</i> • <i>Aligning organisational infrastructures with agility</i> <ul style="list-style-type: none"> - <i>Less hierarchical structures to fluid, flat structure</i> - <i>'Semi-autonomous' / 'self-directed' teams</i> • <i>Open communication:</i>

		<ul style="list-style-type: none"> • Knowledge/information sharing • Utilising an adaptable workplace design
	Provide Efficient operational systems Provide Manager self-service tools Provide timely and accurate HR advice, data and reports Provide Clear policies, guidance and tools	<i>Creating an Agile HR Function</i>
Characteristics of an agile HR function	6. Characteristics of an Agile HR function	6. Characteristics of an agile HR function
	6.2. Agile HR professionals 6.2.1.Knowledgeable about <ul style="list-style-type: none"> 6.2.1.1. Business environment 6.2.1.2.Business strategy 6.2.1.3.Financial challenges 6.2.1.4.Political issues 6.2.1.5.Customers’ issues and requirements 6.2.1.6.Technology 6.2.1.7.Issues of each business functions 6.2.1.8.Emergent issues in world of academia 6.2.1.9.The world of other organisations 6.2.2. Talk the language of the business, not the language of HR. 6.2.3.Creative 6.2.4.Intelligent 6.2.5.Willing to learn new things	<i>Highly capable HR professionals with agile attributes</i> <ul style="list-style-type: none"> • Knowledgeable about <ul style="list-style-type: none"> - Business environment - Business strategy - Financial challenges - Political issues - Customers’ issues and requirements - Technology - Emergent issues in world of academia • Talk the language of the business, not the language of HR. • Creative • Intelligent • Willing to learn new things
	6.1.Transformed HR function roles 6.3. Re-structured HR model 6.3.1.Change the structure of HR toward more centralisation 6.3.2. SAP system that supports the centralisation 6.3.3.Several centres of excellence 6.3.4. Different layers of HR support: <u>online resources, guidance</u> 6.3.5.Business partners : Based on Ulrich’s model <ul style="list-style-type: none"> 6.3.5.1. Benefits of the Business partnering Model <ul style="list-style-type: none"> • Led to strategic HR approach towards business needs • Standardisation and automation through SAP 	<i>Agile and flexible HR structures and work models</i> <ul style="list-style-type: none"> • Change the structure of HR toward more centralisation • Several centres of excellence • Business partners: Based on Ulrich’s model

	<p>system have reduced the wasted time</p> <ul style="list-style-type: none"> • Far less overhead • Reduction in HR operating costs (measurable advantage) • Consistency in the delivery of HR services • Local decision making by line mangers • HR professionals are able to <ul style="list-style-type: none"> • Spend more time on business critical issues • Spent less time on administrative activities • Focus on innovation and creativity • Spend more time on developing managers 	
	<p>6.4. Efficient operational systems</p>	<p><i>Agile HR processes and operational system and efficient HR technologies</i></p> <ul style="list-style-type: none"> • Different layers of HR support: online resources, guidance • SAP system that supports the centralisation • HR self- service technologies <p>Analytic</p>
<p>Agility-oriented HR practices</p>	<p>7. Effective HRM Practices in achieving agility</p>	<p>7. AOHRM Practices</p>
<p>1-Work Design 2-Staffing</p>	<p>7.1. Staffing 7.1.1.Priority Movers Scheme: internal hiring 7.1.2.Workforce Planning: Human Capital Metrics 7.1.3.Access to workforce data</p>	<p>7.1. Staffing</p> <ul style="list-style-type: none"> • Priority movers scheme: internal hiring • Workforce planning: human capital metrics • Access to workforce data • <i>Search for people with agile attributes</i> • <i>Hire for attitude first</i> • <i>Competency-based interviews</i> • <i>Broader recruiting sources</i> • <i>Continuous recruiting</i>

	<p>7.6. Work Design</p> <p>7.6.1.fluid, mobile and flexible roles 7.6.2.broader, less specific, and more generic roles 7.6.3.more generic job descriptions 7.6.4.Ongoing review of roles 7.6.5.Mobility: movement of staff across the organisation 7.6.6.freely deploy and redeploy roles</p>	<p>7.5. Work Design</p> <ul style="list-style-type: none"> • Fluid, mobile and flexible roles • Broader, less specific, and more generic roles • More generic job descriptions • Ongoing review of roles • Mobility: movement of staff across the organisation • Freely deploy and redeploy roles • <i>Agile working framework</i>
3-Talent management	<p>7.3. Talent management</p> <p>7.3.1.Career Aspirations Scheme 7.3.2.Talent Mobility programs 7.3.3.Salary incentives 7.3.4.Employer brand 7.3.5.Well-being 7.3.6.Talent retention</p>	<p>7.3. Talent management</p> <ul style="list-style-type: none"> • <i>Employment branding</i> • <i>Broader recruiting sources / social media</i> • <i>Developing their own talent pipelines</i> • <i>Continuous recruiting</i> • Utilising a range of employee retention programmes <ul style="list-style-type: none"> - Career aspirations scheme - Talent mobility programs - Salary incentives - Employer brand - Well-being
4- Education, Development and Training	<p>7.4. Learning and Development</p> <p>7.4.1.Develop self-management and self-leadership capabilities 7.4.2.Training for managers to manage remotely 7.4.3.Offer many types of training (formal, informal, social, mobile learning) 7.4.4.Lunch and Learns practice</p>	<p>7.4. Learning and Development</p> <ul style="list-style-type: none"> • <i>L&D strategy are aligned to strategic direction, business plan, workforce plan, the vision, values, and desired behaviours and outcomes</i> • <i>Both proactive and reactive approaches</i> • <i>Build a strong learning culture that supports ongoing learning</i> • <i>Include all categories of employees</i> • <i>Continuous skills and capability development, and continuing progress in their careers.</i> • <i>Linked with performance management and talent</i>

		<p><i>management</i></p> <ul style="list-style-type: none"> • <i>Employees have ultimate responsibility for their development</i> • <i>Employees are encouraged to learn multiple competencies and to educate their colleagues by actively sharing information and knowledge.</i> • <i>Online e-learning portal, access to extensive learning resources and online/offline training programmes</i> • <i>Employees are encouraged to work towards membership of professional bodies</i> • <i>Focus on developing agile attributes</i> • <i>L&D programmes embed core values and desired behaviours and outcomes and common performance metrics</i> • <i>Focused on innovation, increasing customer satisfaction</i> <p><i>Include the foundations of:</i></p> <ul style="list-style-type: none"> • <i>Managing change</i> • <i>Systematic approach to solving problems</i> • <i>Questioning techniques and sharing innovative ideas</i> • <i>Self-management and self-leadership capabilities</i> • <i>Provide professional development to managers</i>
5-Performance Management	<p>7.2. Performance management</p> <p>7.2.1. Performance expectations reflect desired behaviours</p> <p>7.2.2. Provide real-time/regular performance feedback</p> <p>7.2.3. Review performance more frequently</p> <p>7.2.4. linked to pay /reward and recognition</p> <p>7.2.5. pay structure that enables progression</p>	<p>7.2. Performance management</p> <ul style="list-style-type: none"> • Performance expectations reflect desired behaviours • Provide real-time/regular performance feedback • Review performance more frequently • Linked to pay /reward and recognition • Pay structure that enables progression • <i>Include some measures that relate to agility</i>

		<ul style="list-style-type: none"> • <i>Goal-setting and performance measurement/review are about KPIs and behaviours</i> • <i>Goal-setting: common performance metrics</i> • <i>Goal-setting focus on individual contributions</i> • <i>Emphasizes contributions in outputs rather than tasks and presenteeism</i> • <i>Continuous performance appraisal and employee feedback</i> • <i>Linked to talent management and L&D</i> • <i>Linked to pay and reward and recognition</i> • <i>Encourages for positive peer review: in some cases, 360-degree reviews</i>
6-Reward and Recognition	7.8. Reward and Recognition	7.6. Reward and Recognition <ul style="list-style-type: none"> • <i>Continuous rewards and recognition</i> • <i>Embed AO behaviours</i> • <i>Linked with performance and behaviours, management, L&D and talent management</i> • <i>Traditional monetary rewards and benefits:</i> <ul style="list-style-type: none"> - <i>Competitive salaries, holiday entitlement, pension scheme, tax-and NIC-advantageous, childcare vouchers</i> - <i>Discounts on company's products</i> - <i>Discounted prices or cash back at featured retailers</i> - <i>Retirement Plan</i> - <i>Profit sharing</i> • <i>Non-monetary incentives or recognition:</i> <ul style="list-style-type: none"> - <i>Gifts, celebrations, dinners.</i> - <i>On-the-spot recognition</i> - <i>Team-based rewards system</i> - <i>Focus on social responsibility</i>

		<ul style="list-style-type: none"> - <i>Flexible working</i> - <i>Benefits reflect the full value of employees' skills, experience and qualifications.</i> - <i>Social rewards and recognition tools</i> - <i>Establish thank you system</i> - <i>L&d opportunities</i> - <i>Career progression opportunities: promote employee mobility</i>
7-Employee Communication	7.9. Employee Communication	7.7. Employee Communication <ul style="list-style-type: none"> • <i>Business status (both positive and negative issues)</i> • <i>Shared values, business plans and objectives, common performance metrics</i> • <i>Create a climate of open and two-way communication</i> • <i>Channels of bottom-up communications. Channels of top-down, side-to-side and inside-out communication</i> • <i>Employees are encouraged to have social interactions</i> • <i>Employ a wide range of communication mechanisms</i>
8-Employee/Labour Relations	7.10.Employee/Labour Relations	Nothing emerged so deleted
9-Work Context	7.7 Agile Working Framework 7.7.1. Different work styles <ul style="list-style-type: none"> • Fixed Space Office Worker • Access Point Worker • Mobile Worker • Field Worker • Home Worker 	Added to Work design with a reduction in unnecessary categories and data

	<p>7.7.2. Benefits of agile working</p> <p>Employees:</p> <ul style="list-style-type: none"> • Improved workplaces and work styles • Higher levels of job satisfaction • Better work-life balance • Improved equality of access to work • Less time travelling to work <p>Business:</p> <ul style="list-style-type: none"> • Lower property operating costs • Enable better use of office space • Enable reduction in property portfolio • Reduce number of workstations • Enhanced recruitment and retention <p>Customer and Community</p> <ul style="list-style-type: none"> • Better customer experience: • Easier access to services • New service delivery options • Opportunity for greater customer contacts • More productive/responsive service • Greater sustainability • Reduce employee travel • Reduce energy consumption • Services delivered locally • Lower carbon footprint <p>7.7.3. Requirements for Implementation</p> <ul style="list-style-type: none"> • Change in work processes / styles / patterns • Shift in organisational culture • Change in workplace design/ technology /infrastructures • Change in job descriptions/ career model / performance management • New HR policies 	
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	<ul style="list-style-type: none"> • New communication process • New leadership style/management approach • Autonomy and empowerment • Independent decision making • Improvement in the employees' technological knowledge /self management skills <p>7.7.4. Mechanisms to support agile working</p> <ul style="list-style-type: none"> • Online agile working guidance pack • Agile working forum • Information packs • ICT workshop sessions • Agile working surgeries • Work style ICT packs • Manager workshops • Occupier forums and drop-in sessions • Building user groups 	
10-Employee involvement	<p>7.11. Employee involvement</p> <p>From culture category: Engagement and Commitment</p>	<p>7.8. Employee involvement</p> <ul style="list-style-type: none"> • <i>Employee forums</i> • <i>Consultation and engagement activities</i> • <i>employee opinion surveys, people insights team, employer listening team, quality of working life committees</i> • <i>Suggestion scheme</i> • <i>Ideas sessions</i> • <i>Motivation: personal satisfaction, self-actualisation and empowerment</i>
	<p>7.5. Leadership development</p> <p>7.5.1.Promote participative decision making style</p> <p>7.5.2.Professional development to manage agile workforce</p> <p>7.5.3.Sessions on performance management process, PDRs, ...</p> <p>7.5.6.Developing managerial competency</p>	<p>This category removed and merged with Empowerment and learning and development</p>

		<p>7.9 Empowerment</p> <ul style="list-style-type: none"> • <i>Delegates more decision-making to individuals and teams</i> • <i>No micro managing</i> • <i>Distribute authority and power based on expertise rather than hierarchical position.</i> • <i>Give autonomy</i> • <i>Create a climate of trust and interdependence and reinforce organisational citizenship and personal accountability.</i> • <i>Promote empowerment by training sessions and coaching development programmes to develop self-management and self-leadership capabilities.</i> • <i>Performance management frameworks support empowerment principles by providing people with the freedom for experimentation</i>

*The new codes are highlighted in *Italic format* in the final template.

Appendix C: Background Information of the Participating Organisations

Organisations' Code*	Type	Industry	Specialties	Company Size
1 Council 1	Government Agency	Government Administration	local government, parks, swimming, housing, adult social care, children, libraries, education, schools	50,000 employees
The organisation is a large city council in the UK, serving a population of a million citizens daily.				
2 Council 2 (Housing dep.)	Government Agency	Government Administration	Local government, housing	900+ employees
The organisation is the housing section of a local council, which provides services as a housing department within the council.				
3 Council 3 (Housing dep.)	Government Agency	Government Administration	Management of council homes and estates	400 + employees
The organisation is an Arm Length Management Organisation (ALMO) which manages council housing as a housing department within a local Council. It is an independent limited company that has its own board of directors, but ownership of council housing stays with the council.				
4 Council 4	Government Agency	Government Administration	Business, Community, Education, Environment, Leisure, Public health, Roads and transport, Social care & health	23000+ employees
The organisation is a Local Government County Council, serving a population of over 830,000 residents with vital services including schools, libraries, social services, trading standards, highways and planning.				
5 Council 5	Government Agency	Government Administration	Education, Protection of vulnerable people, Enterprise, Economic development	4,800+ employees

The organisation is the Local Government County Council, serving a population of around 91,000 people. It provides a wide range of services to the people and businesses in the area, such as schools, housing, waste collection, street lighting, libraries and leisure services.

6	Company 1 (Telecom)	Public Company	Telecommunications	Telephone, Networking, Cloud Services, Unified Communications	89,000+ employees
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The company is one of the world's leading communications services companies, serving in the UK and more than 170 countries worldwide. Their main activities are the provision of fixed-line services, broadband, mobile and TV products and services as well as networked IT services. They also sell wholesale products and services to communications providers in the UK and around the world. In the UK, they are a leading communications services provider, selling products and services to consumers, small and medium sized enterprises and the public sector. Globally they are known as a major technology player, pioneering the digital advances in virtual markets, e-commerce, broadband and mobility, which are shaping and driving the information age. In order to steer changes in the communications services, the company has transformed to a sharp-witted and agile company which put customers at the heart of everything they do.

7	Company 2 (Banking)	Public Company	Banking	banking, financial services	140,000 + employees
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The company is one of the world's leading financial services companies providing a range of retail and corporate banking, financial markets, consumer finance, insurance, and wealth management services. It serves more than 36 million customers world-wide and employs more than 140,000 people.

8	Company 3 (Multi-businesses)	Privately Held	Retail	Food, Pharmacy, Funeral care, Travel, Legal Services, Insurance, Electrical	120000 + employees
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The company is the UK's largest mutual business, owned by over seven million of their customer members. They are not a plc so it makes them competitive for attracting members, customers, and employees. Together, their Group operates 4,800 retail trading outlets, employs more than 120,000 people and has an annual turnover of more than £13bn.

They have a family of businesses in the areas of Food, Pharmacy, Legal Services, Insurance, Estates, Electrical, and Funeral care. Between them, they are the UK's fifth biggest food retailer, a leading farmer, a major insurance provider, the UK's number one funeral services provider, the third largest pharmacy chain and a growing legal services provider.

9	Company 4 (Real Estate)	Privately Held	Commercial Real Estate	Occupier services, tenant rep, landlord rep, investment sales, valuation, retail,	16,000+ employees
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office, industrial

The company is the world's largest privately-held commercial real estate services firm. Founded in 1917 it has 250 offices in 60 countries and 16,000 employees. The company advises and represents clients on all aspects of property occupancy and investment, and has established a preeminent position in the world's major markets. It offers a complete range of services for all property types, including leasing, sales and acquisitions, equity, debt and structured finance, corporate finance and investment banking, corporate services, property management, facilities management, project management, consulting and appraisal. The firm has more than \$4 billion in assets under management through its wholly-owned subsidiary Company 4 (Real Estate) Investors.

10	Company 5 (Utilities)	Privately Held	Utilities	Water Treatment, Waste Water Treatment, Climate Change, Renewable Energy, Reservoir Leisure activities, Dams and Reservoirs, Trade Effluent, Biodiversity, Tankered Waste for Trade, Biosolids Recycling, Education of Water to Schools and Community Groups	5,500+ employees
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The company is the world's fourth largest privately-owned water company. They serve over eight million customers across the heart of the UK by supplying them with drinking water and treating wastewater from communities and businesses across their region. They aspire to be the UK's leading water services company, so agility is regarded as necessary for the company to grow, entering to the new markets and developing new treatment technologies.

11	Company 6 (Law)	Partnership	Law Practice	Legal services	1,200 + employees
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The company is a major UK law firm (Top 45) with eight offices across the UK with over 1200 people. Their services structured along three business lines: commercial, insurance, and public sector. They are a leading national player in insurance with an impressive reputation in the public-sector market, acting for many local, police and fire authorities and a range of NHS trusts. They are growing rapidly mainly because of their strategic focus on two key aspects of their business: their clients and their people.

12	Company 7 (Instruments Manufacturer)	Public Company	Research	UPLC, HPLC, Chromatography, Mass Spectrometry, Informatics, Thermal Imaging, Chemistry, Analytical	5,700 employees
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Standards & Reagents

Being over 50 years in business, the company is one of largest companies in the analytical instruments industry, and one of the best-performing companies in the industry. It has around 5,700 employees operating in 27 countries. The company operates in two divisions: Water Division and TA Instruments. It designs, manufactures, sells and services analytical technologies: liquid chromatography, mass spectrometry, and thermal analysis.

13	Company 8 (Aerospace)	Public Company	Aviation & Aerospace	Civil Aerospace, Defence Aerospace, Marine, Energy, Services	55,000 employees
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The company is a world-leading global provider of complex, integrated power systems and services to the aerospace and marine/industrial power systems markets. The company currently employs over 55,000 people in more than 50 countries around the world. Its strategy is focused on Customer, Innovation and Profitable Growth which means being responsive to customer by understanding and shaping their requirements, and offering them a competitive portfolio of products and services. To ensure this, they need to continually improve and innovate and connect innovation to their customers. So, agility is regarded by the contact person as fundamental to their continued success.

14	Company 9 (Automotive)	Privately Held	Automotive	Transmission and axle manufacturing	13,250+ employees
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The company is the world's largest independent manufacturer of transmission systems for passenger cars and light commercial vehicles. It has 13,250 employees in 23 locations worldwide with over 3 billion Euros turnover. The corporate strategy focuses on competitiveness, profitability and sustainability. The business unit of the company, participated in the research, has around 690 employees, who are long standing, very traditional contracted people that have been in this business a long time.

15	Company 10 (Food)	Privately Held	Food Production	Food Production	24,000+ employees
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The company has evolved from a small scale frozen retail cutting operation in 1993 to a world class food company, serving the retail, foodservice and manufacturing sectors. Today, the company is a diversified food manufacturer with strong market positions in Poultry, Red Meat, Chilled, Bakery and Frozen categories. Their main UK customers include Aldi, Asda, British Airways, Costa, Co-op, Harrods, KFC, Lidl, Marks & Spencer, Morrisons, Sainsburys, Tesco and Waitrose. The group employs around 24,000 people in 49 manufacturing sites in the UK and Ireland, Holland and Poland with annual sales over £3 billion. Their strategy focus on growth and delivering the highest quality product at the lowest cost. Being innovative, agile and responsive is regarded as essential to achieve their strategic goals.

16	Company 11 (Medical Technologies)	Public Company	Hospital & Health Care	Healthcare	1,290+ employees
<p>The company is part of highly regulated medical device and pharmaceutical industry and provides transformational medical technologies and services that are shaping a new age of patient care. It has broad expertise in medical imaging and information technologies, medical diagnostics, patient monitoring systems, drug discovery, biopharmaceutical manufacturing technologies, performance improvement and performance solutions services help their customers to deliver better care to more people around the world at a lower cost.</p>					
17	Company 12 (Electrical Manufacturer)	Public Company	Electrical/Electronic Manufacturing	supplying precision test and measuring equipment and packaging solutions	100-200 employees
<p>The company is an international manufacturer, designer and supplier of quality and process control instrumentation, test and measuring equipment for the tobacco industry and packing and testing equipment for tube manufacturers. It markets its products in tobacco, paper, regulatory, and consumer goods (tube manufacturing) industries. Design, development and manufacturing are all carried out exclusively at the UK head office.</p>					

*Due to confidentiality and anonymity reason, name of the organisations and other information that might help to identify them, have not been used in the thesis. Instead, each organisation was assigned a unique code to be used when presenting data.

