



INSTITUTO
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DE LISBOA

Traditional Confucian Values at Workplace, Employee Satisfaction and Organizational Culture: An Empirical Study

LIN Weifang

Doctor of Management

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ISCTE University Institute of Lisbon
PhD JIANG Hong, Professor,
Shantou University

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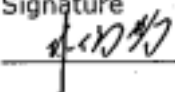
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Abstract

This thesis studies the relationship between traditional Confucian values at the workplace and employee satisfaction and the moderating role of organizational culture in this relationship. Confucianism has been deeply ingrained in Chinese culture for the past two thousand years and the subject of several studies and measurement attempts. We use the scale developed by Q. Wang and Zhang (2012) with harmonious relationships at the core and four dimensions: respect and compliance to authority, tolerance and altruism, acceptance of authority and face. For organizational culture we used Denison and Mishra's (1995) scale with four dimensions: involvement, consistency, adaptability, and mission. For a better understanding of the research problem, we chose the case study approach by selecting a large state-owned pharmaceutical distributor in Guangdong province and its seven subsidiaries with a total of 754 employees. Along a period of several months, with some setbacks, 462 questionnaires were distributed, and 445 valid responses obtained.

Based on the literature review five hypotheses were proposed. We first explored the relationships among Confucian traditional values at workplace, organizational culture and employee satisfaction through descriptive statistical analysis and correlation analysis of the variables. Then, to test the moderating effect of organizational culture on employee satisfaction we conducted hierarchical regression on the four dimensions of organizational culture considered.

Results showed that Confucian traditional values at workplace have a positive effect on employee satisfaction and that organizational culture has a moderating effect on the relationship through the dimensions of adaptability and mission, but not of involvement and consistency.

Keywords: Confucian traditional values at workplace, organizational culture, employee satisfaction, China

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Resumo

Esta tese estuda a relação entre os valores tradicionais Confucionistas, que há mais de dois mil anos estão enraizados na cultura chinesa, e a satisfação dos trabalhadores e ainda o papel moderador da cultura organizacional nesta relação. O Confucionismo tem sido muito estudado e são várias as propostas para a sua medição. Neste estudo utilizou-se a escala concebida por Q. Wang and Zhang (2012) que apresenta quatro dimensões centradas na harmonia das relações: respeito e observância relativamente à autoridade, tolerância e altruísmo, aceitação da autoridade e face. Para medir a cultura organizacional foi utilizada a escala proposta por Denison and Mishra (1995) também com quatro dimensões: envolvimento, consistência, adaptabilidade e missão. Para uma melhor compreensão do problema de investigação optou-se por um estudo de caso e seleccionou-se uma grande empresa estatal de distribuição de produtos farmacêuticos na província de Cantão e as suas sete subsidiárias. A empresa tem 754 trabalhadores tendo sido distribuídos 462 questionários dos quais 445 foram considerados válidos.

Com base na revisão da literatura foram apresentadas cinco hipóteses. Primeiro explorou-se a relação entre os valores tradicionais Confucionistas, a cultura organizacional e a satisfação dos empregados através da análise da estatística descritiva e correlacional. Depois, para testar o efeito moderador da cultura organizacional na satisfação dos empregados, foi utilizada regressão hierárquica nas quatro dimensões consideradas.

Os resultados mostram que os valores tradicionais Confucionistas têm um efeito positivo na satisfação dos trabalhadores e que a cultura organizacional modera esta relação através das dimensões adaptabilidade e missão, mas não das dimensões envolvimento e consistência.

Palavras chave: Valores tradicionais Confucionistas, cultura organizacional, satisfação dos trabalhadores, China

JEL: M12; M14; M54

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摘要

本论文研究了工作场所儒家传统价值观与员工满意度之间的关系，以及组织文化在该关系中发挥的调节作用。儒家思想两千多年来一直是中国文化中极为重要的组成部分，学者们也围绕这一主题多次展开研究和测量。本研究采用 Q. Wang 和 Zhang (2012) 开发的量表，以和谐关系为核心，从四个维度对儒家思想进行分析：遵从权威、宽忍利他、接受权威和面子。对于组织文化，本研究采用 Denison 和 Mishra (1995) 的量表，包含参与性、一致性、适应性和使命性四维度。为了更好地理解研究问题，我们选择了广东省一家国有大型医药流通企业及其七个子公司共 754 名员工进行案例研究。问卷发放环节历时数月，也经历了一些波折，最终我们发出 462 份问卷，并回收了 445 份有效问卷。

在文献回顾的基础上，本研究提出五个假设。我们首先通过对变量的描述性统计分析和相关性分析，探讨了工作场所儒家传统价值观、组织文化和员工满意度之间的相互关系。之后，为了检验组织文化对员工满意度的调节作用，我们对组织文化的四个维度进行了层级回归分析。

研究表明，工作场所儒家传统价值观对员工满意度有正向影响，组织文化通过适应性和使命性两个维度对该影响关系发挥调节作用，但参与性和一致性则没有发挥调节作用。

关键词：工作场所儒家传统价值观；组织文化；员工满意度；中国

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Acknowledgements

I have been surrounded by care and support during the past six years of my doctoral study, for which I feel extremely grateful. Pondering over and exploring for the “silver bullet” for corporate management, I have been trying to apply what I have learned to management practice. As an enterprise manager, I have been motivated to discover the significance and value of management research and realize them in management practice. I will feel most rewarded if such efforts can contribute to the high-quality development of companies and the progress of management research. Luckily, I am not alone. What I have achieved during the past six years could not have been possible without my supervisors, friends and family, to whom I owe a debt of gratitude.

First of all, I want to express my heartfelt thanks to my supervisors, who guided me into management research so I can truly understand its value and significance in practice. My Portuguese supervisor Professor Virginia Trigo and Chinese supervisor Professor Jiang Hong have motivated me with their international vision, rigorous academic attitude, profound knowledge, out-of-the-box thinking and the pursuit for excellence. Inspired by their professional insights, I feel enlightened and therefore pay greater attention to the practice of management skills, the cultivation of management thinking and the use of management tools in my work. Through six years of systematic study, I have developed a more updated and comprehensive understanding of business management, made greater progress in my career development and led the company to a higher level of development.

The completion of this thesis could not have been possible without the unremitting guidance and support from my supervisors, who have devoted a lot of efforts to the entire process of thesis writing, from topic selection and content arrangement to the revision and polishing. Hereby, let me once again convey my most sincere gratitude to my supervisors! Fully aware that there is still much room for me to enhance my academic research ability, I will continue to improve my work and learning so as to live up to the expectation of my supervisors.

Professor Virginia Trigo once said that in the rapidly evolving institutional and organizational environment, management skills should be valued more than ever, and it is management that enables the organization to achieve both efficiency and effectiveness. I have felt this very keenly in my work and study and therefore applied such understanding in my daily management. At strategic level, I stay sensitive to market environment and adaptive in

corporate management. Equipped with rich industry experience, I built a market-oriented standardized management and incentive mechanism and an efficient and empowering enterprise management model with Chinese characteristics, which is regarded as a successful management case well received not only in Guangdong-Hong Kong-Macao Greater Bay Area, but also in China and other parts of the world. I am also deeply influenced by management concepts in corporate organizational reform and governance. During the “Three-year Campaign of State-owned Enterprise Reform”, I learned from the best management concepts and practices of companies home and abroad, and critically analyzed the management notions from the perspectives of government policies, market needs and the company’s situation. Through the institutionalization of the advanced ideas and practices in corporate management, I strive to unify and harmonize management theories and practices and achieve a standardized and innovative way of management.

My thanks also go to the professors from ISCTE-IUL: Prof. Nelson Antonio, Prof. Ma Shaozhuang, Prof. Sandro Mendonça, Prof. Elisabeth Reis, Prof. José Manuel Gonçalves Dias, Prof. José Paulo Afonso Esperança, and Prof. Sun ping. Thank you for the help and inspiration you gave me during my research and thesis writing.

I also wish to thank the professors and teachers from Southern Medical University: Professor Wang Dong, Professor Zhao Di, Ms. Xu Ruimin, and Ms. Ou Weiyan. I truly appreciate the help and support you have given me in my life and study.

Last but not the least, I wish to express my heartfelt thanks to my beloved family for the love and tolerance. You never stopped supporting and encouraging me in my study, work and life, which warmed my heart in times of hesitation and frustration. The love from my family will be cherished forever, and remain as a source of motivation for me to pursue a meaningful and success life.

What’s past is prologue. The busy and rewarding doctoral study is coming to an end, but learning is lifelong. Looking back on the past, I feel proud of myself; looking forward into the future, I am full of confidence and ambition. Empowered by the friendship, love, the sense of responsibility, and the pursuit for my dreams, I will confidently forge ahead and rise to challenges. Always regarding my supervisors as my role models, I will utilize the cutting-edge ideas and thinking of management, lead the high-quality development of enterprises and create a replicable business management model. Through undertaking social responsibilities and devoting myself to the cooperation and development in the nation, region and the world, I will realize the purpose and value of my life. Thank you!

致 谢

六载辛勤求学路，今朝切切念恩情。不知不觉间，我的漫漫读博之路已有六年之久，在不断思考、探索、寻求“济企良方”的过程中实现了学习和工作之间的融会贯通，相辅相成。作为一名企业管理者，管理研究实践意义和价值是促使我投身管理研究的动力之一，如果能通过科学管理进一步加快企业高质量发展进程，同时为管理科学研究的发展和进步作出些许贡献，虽历尽艰辛但始终不悔。六年的成长和进步仅凭一己之力是无法成就的，这期间离不开导师、朋友和家人的支持和帮助，谨此向恩师和亲朋致以最崇高的谢意。

首先，衷心感谢两位导师，让我得以在管理学研究的领域略窥门径，感受到管理学的实用性和重要性。承蒙葡方导师 Virginia Trigo 及中方导师姜虹教授不弃，我有幸获得两位导师的谆谆教诲，导师们国际化的视野，严谨细致的治学风格，渊博深厚的学术造诣，创新前瞻的思维方法，精益求精的科研精神，无一不深深地感染和激励着我，使我感觉醍醐灌顶、受益匪浅，指引我在工作中更加重视管理技能的实践、管理思维的培养和管理工具的运用。这些年来，导师们的高屋建瓴的专业见地使我茅塞顿开，通过系统化的学习，我对企业管理有了更新颖、更全面的认识，不仅让我的职业生涯焕发积极向上的新活力，而且推动我带领企业发展迈上了新台阶。

论文的顺利完成与两位导师的无微不至的点拨和指导密不可分，她们在我论文选题、写作、修改等环节倾注了大量的心血，以辛勤指导和不懈敦促协助我完成论文的编撰工作。在此，我要再次向无私付出的导师送上最诚挚的感谢！我深知，自己的学术研究水平距离恩师的高标准和高要求仍有一定的进步空间，唯有在今后的工作中不断精进自我、持续学习，方能不辜负导师们的悉心教诲和殷切希望。

Virginia Trigo 导师曾经提到过，在快速演变的制度及组织环境中，管理技能比以往任何时候都更应受到重视，是管理使得组织在效率和效果上得到统一。对于这点，无论是在学习的过程中，还是在工作的过程中，我都深有体会，并且深刻影响着我的日常管理工作：在战略方面，我凭借敏锐的市场触觉、灵活的应变能力和丰富的行业经验，逐步打造以市场为导向的标准化管理和激励机制，致力于创立“中国式”高效赋能企业管理模式，作为成功的企业管理案例走出粤港澳大湾区、走出中国、走向世界；

在企业组织变革和治理方面，我同样深受管理学理念影响，在贯彻落实国企改革三年行动的前提下，萃取国内外强企的管理理念精华，分析研判符合当下社会政策、市场需求和企业现状的管理观点，推动新的思想及做法在企业管理中实现制度化，使理论和实际实现和谐统一，也为企业的标准化化管理增添创新助力。

除此之外，我还要将感谢送给里斯本大学学院的教授和老师： Nelson Antonio, Ma Shaozhuang, Elisabeth Reis, Sandro Mendonça, José Manuel Gonçalves Dias, José Paulo Afonso Esperança 和孙平教授，感谢远在异域的老师们在资料调研和写作过程中给予我帮助和启发。

同样地，我也要感谢送给南方医科大学的教授和老师：王冬教授、赵棣教授、许睿敏主任、欧玮艳副主任，非常感谢各位对我生活上的照顾和学业上的支持、帮助。

最后，衷心感谢家人给予我的爱与包容，以最朴实的行动支持我的求学和工作生活，在我失意彷徨的时候给予无私的支持和鼓励，让我时刻感受到来自亲人的暖心慰藉。感谢他们一路相伴，而我也会铭记这份矢志不渝的爱，把它化作我源源不绝的前进动力，迈向成功的彼岸。

凡是过往，皆为序章。紧张、忙碌而又充实的求学生涯即将结束，但我人生的学习之路依旧道阻且长。回首往昔，豪兴不减；憧憬明日，壮志满怀。在今后新的征程中，无论面对多大的困难，我相信自己都能够怀抱着感激、怀抱着情谊、怀抱着责任、怀抱着梦想坚定自信地走下去。希望自己能像两位导师一样，乘骐骥驰骋千里路，驾长风踏破万里浪，利用管理学前沿思想和思维，通过引领企业高质量发展和创造可复制的商业管理模式，充分实现人生价值，积极承担起社会责任，为推动区域、社会乃至国际的合作发展贡献青春力量。谢谢！

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Chapter 1: Introduction

1.1 Research background

In order to effectively address the problems and contradictions in the medical and healthcare field, the Chinese government launched an in-depth medical reform in 2009 following the model of “Four Beams and Eight Pillars” (see Figure 1.1) according to which the healthcare authority required that a guarantee system for pharmaceutical supply and a four-in-one basic healthcare system be set up. To better regulate the pharmaceutical market, it is proposed in the new medical reform that a robust drug supply guarantee system should be established, that a national essential drug system should be built, and that essential drugs should be procured through public bidding and distributed in a centralized manner so as to streamline distribution channels and guarantee essential drug accessibility.

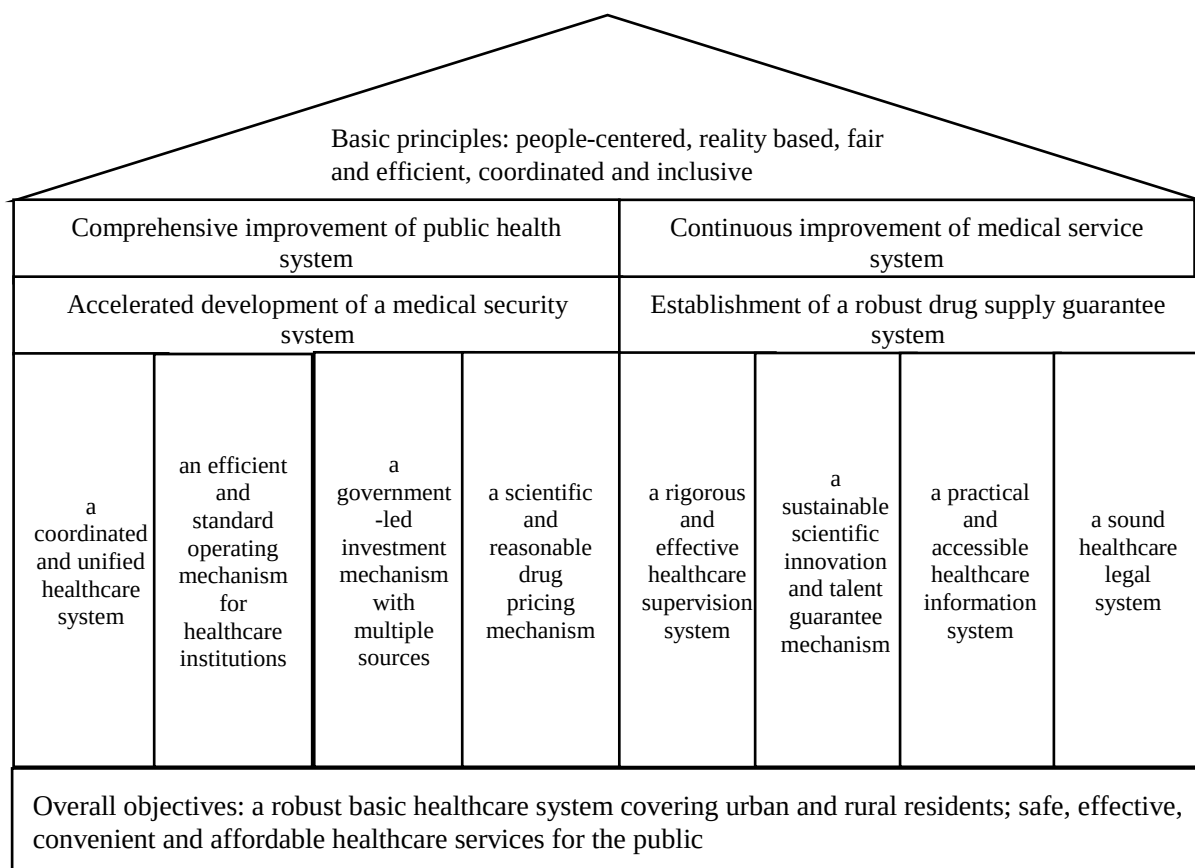


Figure 1.1 Four Beams and Eight Pillars Model of the new medical reform

At the Fifth Plenary Session of the 18th CPC Central Committee in 2015, “Healthy China” was elevated as the national strategy for the first time, and the pharmaceutical industry designated as a key area of development. In 2017, the State Council issued *The Opinions on the Implementation of Healthy China Initiative*, pointing out that the reform of the pharmaceutical and medical device distribution system should be deepened, and the reform of the pharmaceutical distribution sector should be the focus of the medical reform. More recently, in 2020, the Central Committee of the CPC and the State Council further issued the “Healthy China 2030” Plan illustrating a continuous reinforcement and updating of the national strategy.

As an important part of the national economy, the pharmaceutical industry is closely related to the health and quality of people’s life. The industry has two sectors: manufacturing and distribution. The pharmaceutical manufacturing sector is knowledge-intensive, innovation-driven, and high in R&D investment and distribution cost. Pharmaceutical distribution is the intermediary in the pharmaceutical value chain as well as a critical link connecting pharmaceutical manufacturers, medical institutions, and patients. The traditional scope of business of a pharmaceutical distributor mainly includes the wholesale and distribution of drugs and medical devices. In order to reduce medical expenses and ensure public access to affordable medical services, the Chinese government has continuously introduced stringent regulations on pharmaceutical distributors in the process of the new medical reform. In response to such a difficult environment, the pharmaceutical distribution sector in China must experience a massive consolidation and deep adjustment. Indeed, in recent years, it has become more consolidated, but there is still a wide gap compared with its counterparts in Western countries, whose structures are more streamlined.

Since the reform and opening up, China’s pharmaceutical distribution sector has experienced three stages: (1) planned economy, in which the price is set by the government; (2) market economy, in which the price is set by market; and (3) intensive regulation economy, in which the price is not set but regulated by the government. The players of the sector now include state-owned enterprises (SOEs), local private companies and foreign-funded companies (Z. Li, 2020). Since the new medical reform, the introduction of the *National System for Essential Drugs* and hierarchical medical system has driven up the demand of patients with chronic diseases at community hospitals and boosted the pharmaceutical market of primary healthcare. According to the statistics released by the Ministry of Commerce, from 2010 to 2018, the size of the pharmaceutical distribution sector in China increased from RMB 708.4 billion yuan (roughly equivalent to 88 billion Euro) to RMB 2,158.5 billion yuan (269.8 billion Euro), with a compound annual growth rate of 14.94% and a significantly growing market size as well.

At present, China's drug distribution sector presents a "4+N" pattern meaning that it is dominated by four national pharmaceutical distributors (Sinopharm, Shanghai Pharmaceuticals, China Resources Pharmaceuticals, and Jointown) plus a few local distributors. The distribution market in different regions varies greatly in terms of competition landscape and concentration level. The market concentration in Shanghai, for example, is as high as 80%, because the city adopted centralized drug procurement in early years. In many other regions, the dominant players take up roughly 50% of the market share and the remaining half is divided by smaller distributors. A fragmented drug distribution sector is not likely to achieve economies of scale. Therefore, the sector needs to accelerate consolidation and optimize the market landscape through transformation and development. In addition, the pharmaceutical distributors also need to improve management and maintain their core competitive advantages.

1.2 Research problem and objectives

Scholars have pointed out many problems in China's pharmaceutical distribution industry: firstly, the pharmaceutical distribution market is suffering from fragmentation, high expense rate and lack of core competitiveness (J. Zhao et al., 2017); secondly, issues like market disorder, price distortion and lack of innovation are emerging in the pharmaceutical distribution sector ; thirdly, pharmaceutical distributors have a high debt ratio due to poor internal control and financial management (Hao, 2018); fourthly, as a knowledge-intensive sector, the pharmaceutical industry is facing serious human resource challenges, with poor-structured talent teams, few senior and core researchers and ineffective management system (Y. Chen, 2017). In addition, with the opening of the pharmaceutical market, the Chinese government has continuously squeezed the profit margins of pharmaceuticals and medical consumables, driving pharmaceutical distributors to pursue economies of scale through mergers and acquisitions (M&As). Under such circumstances, many pharmaceutical distributors have shifted their focus from quality improvement and innovation to price competition and M&As, which became an important way to expand their size, enter new markets, or acquire key technologies. The constantly changing regulatory and market environments and growing competition bring both opportunities and challenges to pharmaceutical distributors. How to maintain competitive advantages through improved management is then a critical and urgent issue.

With society development, human resources have gradually become a special and important kind of resource for an enterprise. An enabling corporate culture can increase employees' job satisfaction, stimulate their passion for work, and motivate them to pursue personal and

organizational goals. Organizational culture is a soft asset gradually formed with the development of the organization and representing its core values. As an informal and tacit control system, organizational culture also affects different aspects of employee behavior. It is a code of conduct that exerts a subtle influence and helps to create organizational cohesion and a sense of unity. This in turn, increases employee satisfaction and fully unleashes motivation and creativity.

As the mainstream of traditional Chinese culture, Confucianism has a profound influence on the values, attitudes, and behaviors of Chinese people. As the foundation of Chinese management culture, Confucianism plays a critical role in the formation of organizational culture shaped around a value system with Chinese characteristics that is shared by employees. Therefore, the argument presented in this thesis is that Confucian traditional values at workplace do have an important impact on employee job satisfaction, and organizational culture plays a moderating role between these two constructs.

While reviewing existing literature, we noticed that there are not many studies on the moderating role of organizational culture on the relationship between Confucian traditional values at workplace and employee job satisfaction in the context of the pharmaceutical distribution sector in China. By combining theoretical and empirical research we aim at exploring these relationships and, in order to have a deeper understanding of this phenomenon, the research is circumscribed to one large pharmaceutical distribution company: China Meheco Guangdong Pharmaceutical Co., Ltd.

One of the top concerns of all organizations is how to build an organizational culture that can improve employee satisfaction, which in turn, will elevate organizational performance. The exploration of how organizational culture may affect the relationship between Confucian traditional values at workplace, that is, the inherent values of employees and their job satisfaction may provide a practical guidance and a valuable reference for building an adaptive and effective organizational culture in pharmaceutical distribution companies such as the group studied.

1.3 Research contents

Setting Confucian traditional values at workplace as the independent variable, organizational culture as the moderator and employee job satisfaction as the dependent variable, this research explores the mechanisms of these relationship by conducting an empirical analysis of selected

subsidiaries of China Meheco Guangdong Pharmaceutical Co., Ltd. The research model is shown in Figure 1.2.

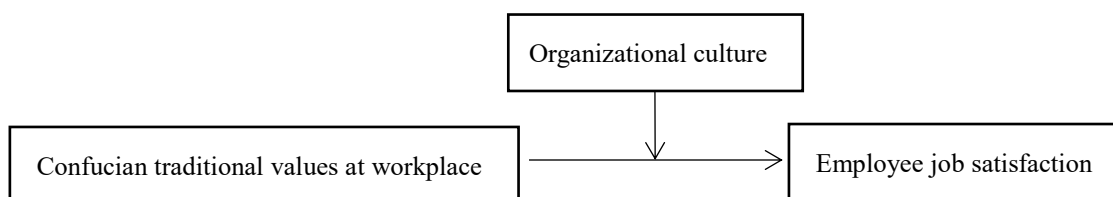


Figure 1.2 Theoretical model

The first chapter of this thesis introduces the background of the research, the problem, and the variables to be studied. It contains a brief review of the development of China's pharmaceutical distribution sector and highlights the challenges the sector faces after the new medical reform. Then it presents the research objectives and significance.

The second chapter covers the literature review that serves as the theoretical foundation. The key concepts of the research – organizational culture, Confucian traditional values at workplace, and employee satisfaction – are defined. Existing research on the topic is also reviewed so as to provide theoretical support to the present work. Literature research is conducted through such databases as Pubmed, CNKI, Wanfang Data, and CQVIP.

The third chapter introduces the conceptual model and research hypotheses as well as the research design and data collection process. It also describes the development environment of China Meheco Guangdong Pharmaceutical Co., Ltd. which is the case company selected for this study. Using the stratified sampling method, employees from selected subsidiaries of China Meheco Guangdong Pharmaceutical Co., Ltd. have been chosen as subjects for the questionnaire survey. Electronic questionnaires were first used but, after collection and processing it was found that the quality of the data was poor. We then distributed paper-based questionnaires and could finally collect a total of 462 valid questionnaires.

The fourth chapter is the empirical analysis. Amos 27 and SPSS 20 software was used to conduct statistical analysis of the data and test hypotheses. The statistical methods mainly include reliability test, validity test, Pearson simple correlation coefficient analysis, two independent samples t-test, single factor variance analysis, multiple independent sample median test, multiple regression analysis, and hierarchical regression analysis.

The fifth chapter presents the discussion of the results and prospects of future research. Limitations are also analyzed and suggestions for future research proposed. Figure 1.3 below presents the research roadmap.

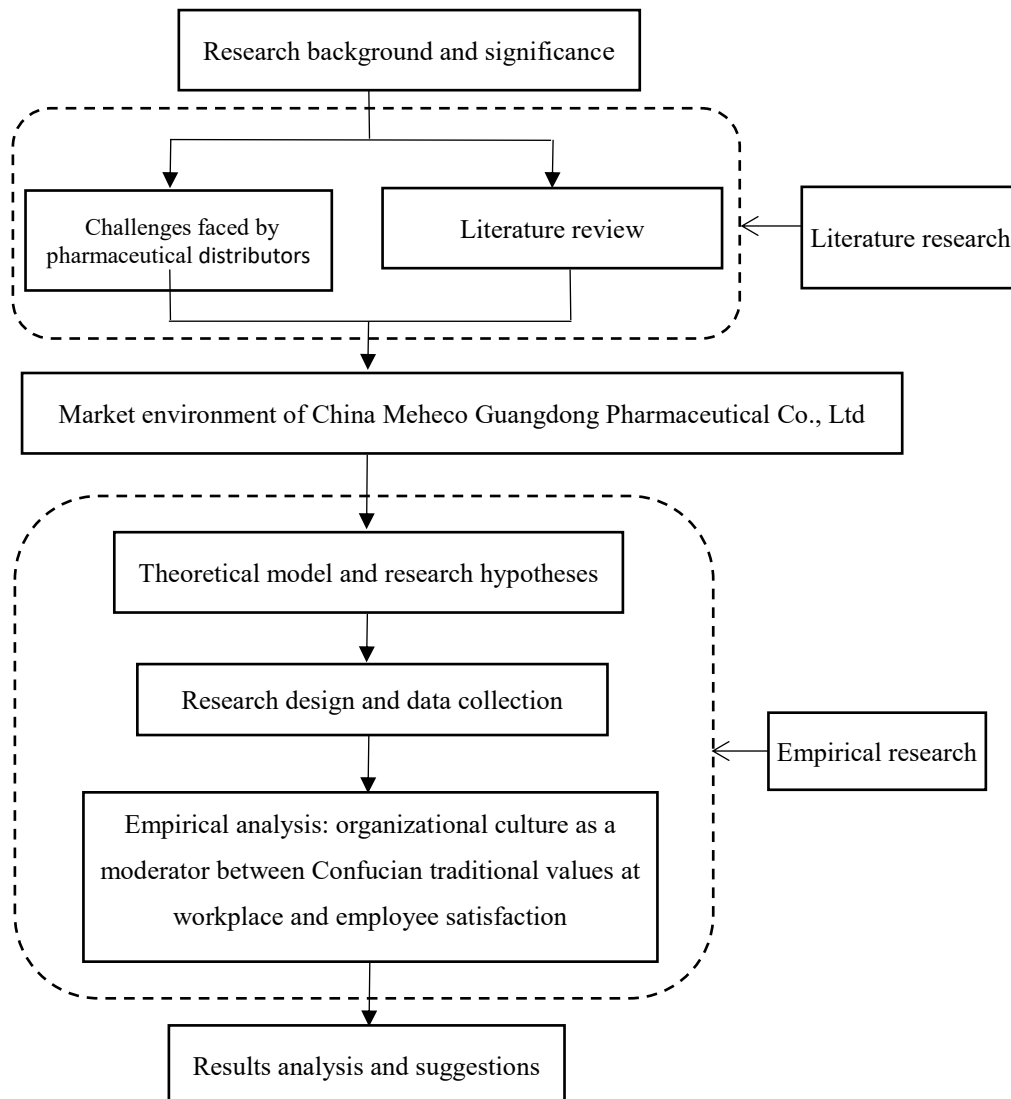


Figure 1.3 Research roadmap

Chapter 2: Literature Review

Based on the research problem previously raised, this chapter will review the literature on the concepts and measurements of organizational culture, Confucian traditional values at workplace, as well as the definition and theories on employee job satisfaction, so as to lay a theoretical foundation for the research.

2.1. An overview of the research on organizational culture

2.1.1 The definition of organizational culture

In the 1980s, Japanese companies demonstrated a strong growth momentum in the fierce market competition. In order to understand the reasons behind their success, American scholars carried out systematic studies to compare corporate management models and methods between companies from the United States and Japan. Eventually they found that the success of Japanese companies could be attributed to their unique organizational culture. Such findings led to the rise of an intensive research interest on the subject. For example, Ouchi (1981) published the book *Theory Z: How American Business Can Meet the Japanese Challenge*, which compared the differences in organizational culture between Japanese and American business management. In the same year, Pascale and Athos (1981) wrote *The Art of Japanese Management* and argued that American-style management is a kind of technology while Japanese-style management is a kind of art. They broke down an enterprise into seven elements, such as strategy, structure, systems, skills, style, staff and shared values and proposed a complete analysis framework to study business management. In 1982, Waterman and Peters (1982) wrote *In Search of Excellence Lessons from America's Companies* and found that the most prominent feature of a successful company is the cultivation of an organizational culture with unique characteristics. Soon after, Deal and Kennedy (1982) wrote *Corporate Cultures*, where they specified five components of organizational culture, namely the business environment, values, company heroes, rites, rituals, and ceremonies, as well as cultural networks, and proposed the important argument that organizational culture influences many aspects of an enterprise. Referred to as the quartet of organizational culture research, these four books made exploratory attempts to define organizational culture, and laid a basic theoretical foundation for future research.

Chinese scholars such as Han et al. (2015) agree with Denison (1995) who conducted a quantitative study on organizational culture and pointed out that the connotation and extension of the concept are too extensive to describe and define objectively. As scholars differ in their research purpose and level, there is no unified and standardized definition of organizational culture in academia. Representative research perspectives on organizational culture in China and abroad will be reviewed in this section.

Schein (1985) believes that organizational culture is a thinking mode based on some basic assumptions, which are the combination of the adaptive behaviors of organizations when dealing with external competition and integrated behaviors in the process of managing internal issues. These assumptions, proved to be effective in practice, can be taught to every new member as the correct way to understand, think and feel about related issues and represent the overall values and behavioral norms of the organization (Yin, 2019) .

Wilkins and Ouchi (1983) pointed out that most of the early research on organizational culture was based on the research paradigm of anthropology. Organizational culture was regarded as a traditional clan and tribal culture and researched through long-term observation following the method of ethnography (Denison & Mishra, 1995). The implied assumption of this paradigm is that organizations, like clan tribes, have a long history and a stable cultural inheritance mechanism, a process during which specific languages and symbols have been formed to convey meanings (Deal & Kennedy, 1982). However, this assumption does not apply to all organizations. In their research, Wilkins and Ouchi (1983) adopted the concept of organizational culture in the anthropological sense and took it as one of the three mechanisms for organizational control. The other two mechanisms are market-based control and hierarchical control (T. Yu & Wu, 2009).

In an early study, G. Hofstede et al. (1990) defined organizational culture through studying its intrinsic properties. He held that organizational culture is a psychological procedure shared by employees with the same educational background and life experience in a common environment, and that it is not only embodied in values, but also in physical objects such as the organization's symbols.

Deal and Kennedy (1982) analyzed the components of corporate culture and posited that it is composed of five factors: values, company heroes, cultural networks, ritual awareness, and business environment, with values as its core. These five factors exert impacts on organizational culture respectively.

More recently, Hartnell (2019) defined organizational culture as the implicit values widely accepted by the members of an organization, which directly determine how they make their

judgement of and respond to the external environment. Such values also play an important role in achieving organizational goals through synergizing with organizational elements.

In the late 1980s, organizational culture was introduced in China and gradually became a hot research topic. Generally speaking, Chinese scholars hold two different viewpoints on organizational culture (W. Zhang, 2016). Some view it as an abstract concept manifested as the ideas, habits, and awareness of a company while others believe that organizational culture is not only mental but also material, and that it is the integrated culture formed during the operation and development of an organization. In the field of economics, scholars generally believe that organizational culture refers to the values commonly shared among the employees which can help them understand the goals of the company, and then evolve into standards that can guide their growth (Qi & Zhu, 2020). The following are some representative views on organizational culture held by Chinese researchers:

According to G. Liu (1999), organizational culture concerns the values, business philosophy and behavioral consensus between a company and its employees and recognized and voluntarily observed by them. For Chen (1999), organizational culture is based on the enterprise value system, and has a meaning both in the broad and in the narrow sense respectively. In the narrow sense, it refers to the spirit and cohesiveness formed in the process of production and operation, as well as to employees' shared values and behavioral norms. In the broad sense, organizational culture also includes the values and behavioral norms of managers and employees. In turn, Du (2018) considers that organizational culture, or corporate culture, is composed of the values, beliefs, ceremonies, symbols, and ways of doing things in a firm. As a unique cultural phenomenon of a corporation, it is the combination of corporate values and behavioral norms.

In the same vein, Jing (2018) explains organizational culture as the values and behavioral norms shared by all employees including material culture, institutional culture, behavioral culture, and spiritual culture. For Professor B. Zheng (1990) organizational culture is an endogenous normative belief, which can be used to guide the behaviors of organization's members.

In summary, Chinese and foreign researchers stress three main aspects in the definition of organizational culture: firstly, it is an endogenous product formed during the development of the organization, and it varies in different companies; secondly, it includes material culture and spiritual culture and is manifested in symbols; thirdly, it can help employees internalize the development strategy and goals of an organization, and convert them into their individual vision

and development goals, motivating them to work hard towards those goals. Organizational culture is also viewed as an institution to constrain employee's behaviors.

Based on the literature review and the research background, organizational culture is here defined as the values and behavioral norms formed over time in the development of an organization. Through the imperceptible and unobtrusive influence and guidance of the management, it becomes the core value system commonly acknowledged and voluntarily observed by the members of the organization.

2.1.2 Models of organizational culture

(1) The Levels of Culture Model

Schein (1989) considers culture as a hierarchical phenomenon and proposes that it should be studied via hierarchical qualitative methods. As such, organizational culture can be divided into three levels, namely (1) artifacts, (2) espoused beliefs and values, and (3) underlying assumptions, which are the core of organizational culture. The following is a more detailed description of the relationship among different levels of culture.

The first level, artifacts, is the external and most noticeable level of organizational culture and relates to everything that can be seen or heard. In a sense, artifacts are something objective, visible and tangible, such as visual organizational structures and processes, operating mechanisms, and rules and regulations. They can be readily observed when one enters the organization and therefore reveal some of its important characteristics. In addition, artifacts also include cultural elements that can be intuitively felt or experienced, such as the organizational atmosphere, employee attitudes, behaviors, and legends (Yin, 2019). As it is not enough to understand organizational culture just intuitively, it is necessary to go to the next level to explore a deeper connotation of the concept.

The second level concerns espoused beliefs and values. Shared beliefs are developed over time in the practice and development of the organization. They continuously serve as a guidance and eventually become the shared values and behavioral norms recognized and observed by all members of the organization. They are manifested in the corporate strategy, vision, objectives and business philosophy (J. Zhou et al., 2019). When organizational values conflict with underlying assumptions such as ethical codes and moral norms, inconsistencies may emerge between the exposed values and the observed behaviors. Therefore, it is necessary to enter the third level of analysis.

The third level concerns underlying assumptions, which are subconscious thoughts and beliefs held by the members of the organization. There are mainly three types of underlying

assumptions: (1) those about reality and truth, which explain the differences in external facts, social facts and individual facts of the employees' perception of things; (2) the assumptions of the nature of time and space, which solve problems caused by differences in these variables occurred during the management and operation of the organization; (3) the assumptions about human nature, human activities and interpersonal relations that address the issue on which should incentives and control be based and concern not only the behaviors of the members of the organization, but also the relationships between formal and informal organizations, and between individuals and groups (I. Zhou et al., 2019). The level of underlying assumptions is the foundation for the first two levels to perform their functions. Decisive and stable, it is also the core level of organizational culture. The underlying assumptions help the organization effectively solve many problems in dealing with external adaptability and internal integration.

(2) Hofstede's Model of Cultural Dimensions

From 1967 to 1973, Hofstede conducted a large-scale survey of more than 100,000 IBM employees from more than 50 countries on their cultural values and proposed a Model of Cultural Dimensions that first consisted of four dimensions, namely power distance, individualism versus collectivism, uncertainty avoidance, and masculinity versus femininity (X. Zhang & Han, 2008). Later, Hofstede (1988) proposed the fifth dimension, long-term orientation versus short-term orientation based on Michael Bond's survey on Chinese values. In 2010, Hofstede proposed a sixth dimension of indulgence versus restraint in his book *Cultures and Organizations, Software of the Mind*, which further enriched the cultural dimensions (G. H. Hofstede et al., 2010).

Hofstede's model of cultural dimensions is mostly used in cross-cultural research and different Chinese scholars have also applied it in their analyses. For example, J. Liu (2017) stresses that power distance is used to measure the acceptance of the unequal distribution of power in the society or inside organizations by vulnerable groups and includes two aspects: autocracy and democracy. Organizations with a lower power distance index emphasize fairness and justice and pursue fair distribution of power with a stronger sense of social justice; organizations with higher power distance indexes emphasize authority and hierarchy, with a stronger sense of social injustice, but they can still succeed if employees are willing to accept hierarchical order and inequality in power distribution. X. Zhang and Han (2008) describe individualism versus collectivism as a reflection of how employees choose between individuals and the collective. Believers in individualism advocate the independence of people and contend that meeting individual needs is the goal of social development; they pay attention to caring for individual members and emphasize the realization of personal goals and personal values.

Advocates of collectivism believe that collective interests prevail over individual interests, emphasize the creation of group goals and common interests, and value group relationships and individual loyalty to the organization. Organizations with a stronger sense of collectivism have a stronger sense of collective belonging, honor, and responsibility

In turn, X. Wang (2019) understands the dimension of uncertainty avoidance as mainly referring to the degree to which organization members feel uneasy under uncertain or unknown situations. Generally speaking, companies with a high degree of uncertainty avoidance tend to be prepared for danger in times of peace and safety, and establish rigid and standardized organizational rules and regulations to minimize risks, avoid disagreements and enhance predictability. Companies with a low degree of uncertainty avoidance generally have relatively loose organizational rules and systems, show greater tolerance for unfamiliar things, hold optimistic views, and tend to be more relaxed in a stressful environment. Such companies often encourage risk-taking.

W. Li (2009) and later A. Huang and Zheng (2020) propose that the dimension masculinity versus femininity reflects the degree to which “traditional” gender roles are assigned in the society as a whole and, in the organization context, concerns which management methods are adopted by the company. For example, a company with a strong masculinity usually holds a dominant position, emphasizes success, competition and achievement, stresses progress, persistence, self-confidence, and decisiveness. Companies with stronger femininity tend to adopt a less radical approach in their management and operation, emphasize moderation and harmony, advocate ethics, humility and caring for others, and pay more attention to interpersonal relationships and quality of life.

Long-term orientation versus short-term orientation reflects whether the decision-making of the organization is more influenced by the past, present or future. Companies that are long-term orientated pay more attention to the future and long-term results. Short-term oriented companies pay more attention to the past and the present, value short-term interests, cherish tradition and heritage, maintain corporate image, and assume corporate responsibilities (J. Yan et al., 2020).

(3) Competing Value Framework

Campbell and his team (1974) designed an organizational culture measurement system with 39 indicators. Quinn and Rohrbaugh (1983) thought the system too complicated and difficult to apply, so they conducted a cluster analysis of the system and found two dimensions for analyzing organizational effectiveness. The first dimension is the vertical axis, with flexibility and discretion at the top and stability and control at the bottom; the second dimension is the

horizontal axis, with internal focus and integration on the left and external focus and differentiation on the right. These two dimensions constitute four quadrants, representing four different organizational models: human relations model, open systems model, internal process model, and rational goal model respectively.

Later Cameron and Quinn (2011) applied the Competing Value Framework to organizational culture and divided it into four types: clan organization culture, adhocracy organization culture, hierarchy organization culture, and market organization culture (T, Yu & Wu, 2012) .

As a typical Japanese corporate culture, clan organization culture focuses on the internal part of the company and has a certain degree of flexibility. This type of organization values interpersonal relationships. Organization members trust each other, share common goals and values and learn experience and skills from each other. They have a spirit of collectivism and strong cohesion. Such organizations value harmonious interpersonal relationships and teamwork, unite employees through loyalty and tradition, and support employees' individual development and the realization of personal goals. The success of the organization heavily relies on its human resources (L. Wang, 2013).

Commonly found in companies that develop original products such as software, adhocracy organization culture is relatively more flexible and external-oriented. Such organizations value innovation and encourage employees to explore and innovate. Employee failure is tolerated and acceptable. Employees in such organizations are innovative, imaginative and adventurous. They are ready to learn from those who are more knowledgeable and experienced. The organizations attract employees through continuous experimentation, reform and innovation and the success of the organization mainly relies on the provision of unique products and services (Jan, 2012b).

Hierarchical organization culture generally exists in highly institutionalized and highly structured organizations. Such organizations manage employees through a high degree of institutionalization, a complete organizational structure and strict discipline. They adopt institutionalized management, and tend to create a formal, hierarchical work environment. Their success is mainly based on low-cost, high-efficiency operations (T. Yu & Wu, 2012) .

Market organization culture pays more attention to linking with the external environment and stresses external competition and control, as well as the maximization of benefits. Most employees in such organizations are task-oriented and result-oriented. The success of the organization is achieved through gaining high market share and concentration (L. Wang, 2013).

(4) Denison's Organizational Culture Model

In 1995, Denison and Mishra (1995) used grounded theory and questionnaire survey to conduct empirical research on five companies, and developed the Denison Organizational Culture Model, which proposes four types of cultural traits of an ideal organizational culture, namely involvement, consistency, mission, and adaptability.

Adaptability mainly reflects the ability of the organization to respond to the changes in the external environment, which includes the ability to capture various signals from the market and customers and the ability to respond to environmental changes (H. Zhang, 2015). The trait of adaptability includes three dimensions: organizational change, customer first, and organizational learning. Organizational change refers to the ability of the organization to quickly respond to environmental changes and to the willingness to try new things; customer first refers to the ability to understand and meet customer needs in a timely manner and to predict the future needs of customers; organizational learning concerns whether the organization can quickly encourage innovation and provide development opportunities for its employees after recognizing changes in the environment.

Involvement mainly refers to employees' work ability, sense of responsibility, and to the attention they attach to their own job responsibilities. Involvement includes three dimensions: authorization, team orientation, and capability development. Authorization refers to granting employees certain powers and clearly defining their responsibilities and powers, so that they have a strong sense of ownership and responsibility; team orientation means that the organization values cooperation among employees for common goals; capability development means that the organization is willing to continuously invest resources to improve employees' capabilities, and meet their learning needs (X. Li, 2020).

Consistency is mainly used to measure the cohesion and unity within the organization. The cultural trait of consistency includes three dimensions, namely coordination and integration, collaboration, and core values. Coordination and integration refer to the efficient communication and close cooperation among various departments of the organization; collaboration refers to the ability of organizational leaders to enable employees to reach consensus on major decisions and key proposals; core values means that the organization has in place values that are commonly recognized and accepted by all the members, which generate a strong sense of identity and cohesion among them (W. Ma, 2014).

Mission is mainly used to tell whether the company focuses on immediate benefits or long-term strategy. The cultural trait of mission includes three sub-dimensions: vision, strategic orientation, and goal. Vision means that employees reach a consensus on the vision of the organization, which is understood and recognized by all; strategic orientation means that the

organization has formulated a clear development strategy and planning, which points out the direction for employees' work; the dimension of goal means that the organization has formulated specific targets closely related to the mission, vision and strategy, which serves as the reference for employees' work (Goffee & Jones, 1996; W. Ma, 2014). Compared with the organizational culture models by other scholars, Denison's model is more detailed in its description and more extensive in its coverage of organizational culture and can therefore be widely applied to various companies.

Other scholars have also made insightful explorations in organizational culture research. For example, Goffee and Jones (1996) proposed a "double S cube model" based on the two dimensions of sociality and solidarity, dividing organizational culture into four types, namely network-based culture, communal culture, fragmented culture, and mercenary culture. Each type has two basic forms: positive and negative. Johnson and Scholes (1988) proposed the cultural web model from the perspective of the interrelationship between the elements of organizational culture. The culture grid includes seven elements, namely stories and myths, symbols, ritual and routines, the paradigm, power structures, organization structures and control systems. They are interconnected to each other to form an organic whole, but the relationship and measurement among these elements are not well-established yet and the concept has not gained enough traction to encourage further research.

2.1.3 Organizational culture measurement

As mentioned above, researchers from different countries have conceived various organizational culture models based on their research focuses. Organizational culture continues to be a subject of extensive research and both qualitative and quantitative methods have been used, but most of the existing measurements of organizational culture are based on quantitative research using scales. Some widely recognized and accepted organizational culture scales will be introduced in the following part.

1) OCAI Scale (Organizational Culture Assessment Instrument)

In 1999, Cameron and Quinn (1999) proposed the Organizational Culture Assessment Scale based on the competitive value framework. Through literature review and empirical research, they extracted 6 criteria to classify the concept: the dominant culture of the organization, leadership style, employee management, organizational cohesion, strategic focus, and success criteria. OCAI has a total of 24 test items that belong to six dimensions to classify organizational culture. Each dimension includes four declarative sentences that correspond to four types of organizational culture, namely, clan organization culture, adhocracy organization culture,

hierarchy organization culture and market organization culture (M. Zhang & Zhang, 2004). Quinn and Cameron pointed out that, as it evolves, organizational culture is a mixture of the four different types. Using the OCAI scale to measure the organizational culture will generate a cross-sectional quadrilateral diagram, which indicates the overall feature of the organizational culture of a company, including its type, strength, and consistency (L. Wang, 2013) .

The OCAI scale was originally only designed to identify the current cultural type of an organization, as the respondents score the degree of conformity between the organization's cultural characteristics and the measurement items in the scale based on their perception. With the advancement of research on this topic of both theoretical exploration and practical application, the OCAI scale can not only be used to diagnose the current culture of an organization, but also to measure its expected culture. Through comparing the current corporate culture with the expected culture, weaknesses can be found, and the future development direction be pointed out (X. Sun, 2020).

2) OCQ (Organizational Culture Questionnaire)

Denison and Mishra (1995) developed the Organizational Culture Questionnaire based on the theory of cultural traits. As mentioned above, the Denison Organizational Culture Model displays four quadrants based on two paired dimensions (flexibility-stability and internal focus—external focus), corresponding to the four cultural traits of adaptability, mission, consistency, and involvement. Each cultural trait has three sub-dimensions, and each sub-dimension is measured by five items. Eventually, an organizational culture measurement system composed of four cultural traits as the core, twelve sub-dimensions as the intermediate link, and 60 items as the final measurement indicators is formed (X. Sun, 2020).

As the OCQ scale includes more sub-dimensions, it explains organizational culture in a more detailed and comprehensive manner, has strong operability in practice, and is widely accepted as an effective tool for organizational culture measurement (O'Reilly et al., 1991; W. Ma, 2014).

3) OCP (Organizational Culture Profile) Scale

O'Reilly et al. (1991) studied the relationship between individual and organizational fitness and individual effectiveness (such as job performance, organizational commitment, and turnover) from the perspective of fitness, based on which they developed the OCP scale. The scale consists of seven dimensions, namely team orientation, detail orientation, result orientation, innovation, aggressiveness, stability, and respect for people, as well as 54 measurement items (Dai & Xu, 2018). OCP is considered to be a relatively influential and commonly used scale in the study of employee-organizational fitness.

Unlike other studies that use the percentile system or Likert score method, the OCP scale uses the Q-sort scoring method according to which the measurement takes place in two steps. In step one, the respondents are asked to describe the perceived organizational culture, and in step two, they are asked to describe their desired organizational culture. The results of the two steps of measurement will be compared and analyzed. This method makes it easier to identify the values that the organization attaches more importance to, which can then be compared with those that the organization prefers to identify the key areas for improvement, which is crucial to the design and nurture of organizational culture (Hu, 2012).

In addition to the three scales introduced above, other researchers have also explored and analyzed organizational culture. Barrett (2013) took an inter-disciplinary approach to integrate philosophy, management and psychology and apply the hierarchy of needs to corporate management. He proposed seven levels of corporate awareness, which are, from lower to higher, survival consciousness, relationship consciousness, self-esteem, switching consciousness, enterprise consciousness, organizational awareness, and social consciousness. Based on these levels, he designed a corporate culture conversion tool scale which includes 11 main cultural categories, 21 specific indicators, and a total of 180 statement items in the questionnaire. This serves as a feasible path for quantitative analysis of organizational culture, but nevertheless lacks a certain degree of credibility (H. Xie, 2007).

More recently, several Chinese scholars have also started to conceive ways to measure corporate organizational culture in China mainly focusing on two aspects: firstly, revising summative research on organizational culture models and scales developed by foreign researchers; secondly, modifying these models according to Chinese cultural characteristics, and conducting empirical research on Chinese corporate organizational culture. Some representative research by Chinese scholars will be introduced next.

4) Organizational Culture Value Analysis Scale by Boxun Zheng

As mentioned by W. Zhang (2016), Boxun Zheng, a professor of psychology developed the Values in Organization Culture Scale (VOCS), which includes nine dimensions: seeking truth from science, customer orientation, innovation, and excellence, sharing weal and woe, team spirit, integrity, performance, social responsibility, and good neighborliness. Empirical research has found that these dimensions can effectively distinguish different organizational cultures (W. Zhang, 2016).

As the first localized scale in China, the VOCS scale emphasizes the role of organizational culture in guiding employee behavior. Useful as it is, the scale is not very practical since the description of the scale items is too abstract to understand easily.

5) Organizational Culture Analysis and Measurement Model by School of Economics and Management of Tsinghua University

L. Liu and Zhang (2007) constructed an organizational culture measurement model from the perspective of organizational value judgment. They analyzed organizational culture based on the two dimensions of “the organization’s value judgment on management behavior” and “organization’s value judgment on stakeholders” and proposed eight elements for value judgment on management behavior, including: result – process orientation; learning – experience orientation; innovation – conservation orientation; competition – cooperation; system – leadership authority; collective – individual orientation; open communication – closeness; and relationship work orientation. These elements are placed in four quadrants by the two dimensions of “focus on balance – focus on development” and “focus on organization – focus on people”, and each quadrant contains two sets of behavioral connotations. The scale has a total number of 55 measurement items.

6) Corporate Culture Assessment Scale by China Corporate Culture Measurement Center

Focusing on corporate strategy, values, leadership, and team atmosphere, China Corporate Culture Measurement Center (CCMC) designed a corporate culture assessment scale that includes 37 measurement items and six dimensions, namely corporate culture types, concept orientation, core values, environment, leadership, personal values, and professional orientation (M. Liu & Xiao, 2011; Teng, 2006). The corporate culture assessment scale has been well applied in many industries and has basically generated a relatively complete cultural assessment database in China (Teng, 2006) .

In addition, Beijing Redetac Consulting Co., Ltd. have developed the “Corporate Culture Diagnosis and Assessment System”, which measures organizational culture covering 12 dimensions, including work environment, organizational system, management methods, internal communication, employee incentives, leadership and decision-making, training and employee development, employee motivation, employee satisfaction, employee loyalty, cultural building, as well as philosophy and values. According to (M. Liu & Xiao, 2011), this is China’s first systematic corporate culture diagnosis and assessment method and tool. The same authors also acknowledge that the Guanghua School of Management of Peking University has also developed an organizational culture assessment scale mainly applied in corporate culture consulting based on the case study method (M. Liu & Xiao, 2011). The scale includes over 40 testing questions covering eight dimensions, namely: customer orientation, long-term orientation, result orientation, action orientation, control orientation, innovation orientation, harmony orientation and employee orientation.

2.2 Overview of the research on Confucian values

2.2.1 The development of Confucianism

During China's Spring and Autumn and Warring States period, after the changes in the Xia, Shang, and Western Zhou dynasties, the ruling class represented by slave owners and aristocrats gradually declined. The "nine squares" system (of private land ownership in China's slave society) began to collapse. As a result, the ruling order established by the Zhou Dynasty could not continue to maintain its dominant position, and the society was in turmoil (B. Guo, 2013). In order to solve the social problems, intellectuals of different classes proposed different solutions based on the interests and requirements of their own class, resulting in the great cultural prosperity known as "contention of a hundred schools of thought". The most influential schools of thought at the time were Confucianism, Taoism and Mohism. Ip (2009) pointed out that Confucianism is the most lasting and most important force in Chinese philosophical thought and values, as well as the ethical norm and behavior guide that has long been widely revered by individuals and organizations. As Confucianism has a profound influence on the values of Chinese people, it has been the focus of research on Chinese values and its development has mainly experienced the following four stages:

(1) Confucianism in Pre-Qin period - the early emergence of Confucianism

Confucianism began to emerge in the pre-Qin period, represented by Confucius, Mencius, and Xunzi. The thoughts of Confucius (551 – 479 BC) are the origin and foundation of Confucianism, while Mencius and Xunzi brought a pragmatic dimension to it (Y. Yan, 1998).

As the founder of the Confucian school, Confucius studied the Zhou Dynasty's rituals and music system, and proposed the concept of "benevolence" (Ren) as the core, "rituals" (Li) as the norm, and "cultivating one's self and peace" as the value orientation. Confucius advocated maintaining social stability through benevolent kindness, benevolent integrity, and benevolent governance, and emphasized that rulers should rule the world by virtue (X. Wang, 2003). Complementing "benevolence" is the modest management method (the golden mean), which advocates adopting a moderate and appropriate way of doing things, neither in excess nor in deficiency (X. Li, 2010). Confucius led his disciples to try to persuade the feudal princes of various states to implement his thoughts but failed. Later, Mencius (372 – 289 BC) inherited and developed these beliefs, applied Confucius' thought of "benevolence" to politics, and proposed a theoretical system of "benevolent governance" for political management. He

advocated a people-oriented approach, arguing that “people is above everything else, society comes the second, and the emperor is the least important” (T. Luo, 2012). At the end of the Warring States period, Xunzi (316 – 238 BC) further enriched Confucianism based on the thoughts of Confucius and Mencius. Xunzi advocated the simultaneous use of etiquette and law in politics and the need to generate more income and reduce expenditure in economics. He argued for original evil of human nature, believing that humans were born evil and therefore people's behavior should be constrained through ritual education and legal punishment (Jiang, 2016). Thanks to Mencius and Xunzi, Confucianism experienced preliminary development, and then transitioned from a preliminary theoretical framework to a complete theoretical system.

(2) Confucianism in the Han Dynasty – the formation stage of Confucianism

The Han Dynasty is the second important stage of the development of Confucianism. The main difference from the pre-Qin Confucianism is that the Confucianism of the Han Dynasty established a set of ideological systems centered on the interaction between heaven and man with the theory framework of Yin and Yang and the Five Elements. Dong Zhongshu (179 – 104 BC) was the representative of Confucianism in the Han Dynasty (Chen & Ma, 2018). Unlike Mencius and Xunzi who had to have lecture tours and to lobby the ruling class to adopt Confucianism in national governance, Dong Zhongshu's argument for Confucianism was directly adopted by Emperor Wu of the Han Dynasty, and Confucianism was applied to political and social governance. Since then, it became the official philosophy of ancient China (L. Xu & Deng, 2019).

On the basis of traditional Confucianism, Dong Zhongshu integrated the Legalist theory that “the emperor is superior and the ministers are inferior” and the Taoist theory of the unity of nature and man into the Confucian ideological system. He established a governance system integrating the divine power, monarchical power, patriarchal power and husband's power, with Confucianism at the core, playing a key role in the stability of ancient Chinese agricultural society (B. Guo, 2013). Emperor Wu of the Han Dynasty adopted Dong Zhongshu's propositions and implemented the policy of “rejecting a hundred schools of thought and making Confucianism the dominant philosophy”. The combination of Confucianism and ruling politics enabled it to rise from a school of thought to a dominant ideology. Early Confucian works such as *The Book of Songs*, *The Book of History*, *The Book of Rites*, *The Book of Music*, *The Book of Changes*, and *Spring and Autumn Annals* were regarded as classics and helped Confucianism to gradually become the mainstream of traditional Chinese culture (Y. Yin, 2004). In his book *Good Countermeasures*, Dong Zhongshu built an ethical and moral system for ideological education with the “Five Ethical Norms” as the core (B. Deng, 2005), namely benevolence(Ren),

righteousness (Yi), propriety (Li), wisdom (Zhi), faithfulness (Xin). The establishment of this ethical and moral system has solidified and developed Confucianism in both theory and practice.

(3) Neo-Confucianism in the Song and Ming Dynasties – the heyday of Confucianism

During the Northern Song Dynasty, the cultural atmosphere was relatively relaxed. Then Confucian scholars launched activities to revive Confucianism and criticize Buddhism. At the same time, they also borrowed terms and concepts from Buddhism and Taoism to interpret Confucian doctrine, forming a new Confucian system with rationalist ethical philosophy (Li) as the core. The development of Confucianism entered a new stage in the Song and Ming Dynasties and was designated Neo-Confucianism (L. Zhang, 2000). Integrating Buddhism and Taoism, Neo-Confucianism inherited traditional Confucianism while evolving into a new form (C. Yang, 2019). The representative figures were Zhu Xi, Wang Yangming, Zhang Zai, Cheng Hao and Cheng Yi. These later two, since they shared similar views and had been the disciples of the same teacher (Zhu Xi), were referred as the “two Chengs” by academic circles. As founders, they epitomized the main thoughts of Neo-Confucianism.

Both Zhang Zai and the “two Chengs” paid more attention to the discussion of the origin of the world. The difference was that Zhang Zai believed that the origin of everything in the world is “Qi” (vital energy), and the two Chengs believed that the origin of the world is “Li” (rationality) (Lin, 2000). In addition, Zhang Zai proposed that the basic attributes of Qi are movement and stillness, and that people should understand things through practice and master the law of development of things (B. Guo, 2013). Wang Yangming, a philosopher in the Ming Dynasty, proposed that the mind is rationality, and emphasized the subjective initiative of human beings. His philosophical propositions of “conscience” and the methodology of “the unity of knowledge and action” contributed to the breaking of feudal ideological constraints and the liberation of thought and personality (Lin, 2000). As an important branch of the Confucian philosophical system, the Neo-Confucianism of the Song and Ming Dynasties advanced Confucianism to be a highly philosophical, political, and theoretical system.

(4) Modern Neo-Confucianism – a new stage of development

The influx of Western culture after the Opium War exposed the weaknesses of Confucianism, and its orthodox position was jeopardized (C. Pi, 2019). During the Republic of China period, Dr. Sun Yat-sen combined Western democratic experience with the Confucian political system and created the “Three People’s Principles” (Nationalism, Democracy, the People’s Livelihood), which is of great significance to Chinese political modernization (C. Bai, 2003). During the New Culture Movement, intellectuals represented by Chen Duxiu believed that “Chinese learning provides substance and Western learning is for practical use” and that

Confucianism could not solve China's problems, proposing that China should experience ideological and philosophical transformation in order to survive. Therefore, they thoroughly criticized Confucius and Confucianism and put an end to its ideological dominance (C. Li, 2019). After the founding of the Communist Party of China, a group of scholars with lofty ideals continued to explore and promote the adaptation of Marxism in China, a process of integrating Confucian culture into Marxism. The absorption of Confucianism into Mao Zedong Thought is a perfect example of the combination of Marxism and Confucianism, as well as a special form of Confucianism modernization (R. Guo, 2018). After the founding of the People's Republic of China, Confucianism came under strong criticism due to political and historical reasons, especially during the Cultural Revolution. In the 1980s, research on Confucianism gradually re-emerged, as scholars and researchers began to direct their attention to this philosophy once again.

2.2.2 The content and structure of Confucianism

Confucianism is a philosophy about harmony. At a personal level, it includes nine aspects of moral values such as benevolence, righteousness, propriety, wisdom, faithfulness, forgiveness, loyalty, filial piety, and respect for elderly brother, the first five of which are collectively referred to as the "Five Ethical Norms". Benevolence and righteousness are the core of Confucianism, which runs through all moral values that constitute Chinese traditional cultural system (C. Wang & Zhang, 2012).

"Benevolence" (Ren) means respecting and caring for people and recognizing people's value and dignity. It is the highest moral standard in Confucianism (K. Liu, 2013). According to Guo (2013), the connotation of "benevolence" mainly includes the following three aspects: firstly, one should love his ancestors and parents, which is in accordance with human nature and instinct; secondly, and on the basis of "taking benevolence as filial piety", one should love his relatives in the extended family since "kind people love others" as proposed by Confucius; thirdly, one should have love for humanity. The connotation of "benevolence" is further expanded from filial piety to ancestors and parents to mutual care and love between relatives and family members. Confucius argued that "benevolence is about restraining oneself for the sake of propriety", and that in order to achieve benevolence, "one should not look at, listen to, speak or do what is contrary to propriety". In this sense, benevolence has gone beyond the narrow meaning of care and love between family and relatives but extended to the wider meaning that rulers (and managers likewise) must have universal love and love for the humanity.

"Benevolence" (Ren) and "righteousness" (Yi) are the basic elements of Confucianism.

Benevolence focuses more on emotional aspects, while righteousness focuses more on norms (T. Luo, 2012). Righteousness has two meanings. First, people's thoughts and behaviors must conform to ethical norms; secondly, justice and virtue should outweigh personal profits and gains. Confucianism holds that righteousness is the standard for judging whether people's thoughts and behaviors are appropriate. Only when righteousness is regarded as the value standard and a behavioral norm can we properly handle the relationship between individuals and society and create a harmonious atmosphere (B. Guo, 2013; C. Liu, 2014) .

“Propriety” (Li) refers to the code of conduct that regulates the relationship between married couples, elder and young, and superiors and inferiors. It is the human relationship order that has evolved throughout history (Y. Yu, 1989) . Propriety is not only the basic external norm to regulate social relations, but also plays an important role in maintaining the harmony of interpersonal relations. It is mainly reflected in (1) promoting harmonious interpersonal relations through self-cultivation and self-discipline; (2) maintaining harmony through courtesy and mutual understanding; (3) promoting harmony through respect for others and self-esteem (B. Guo, 2013) .

“Wisdom” (Zhi) refers to knowledge and intelligence. It is the ability to distinguish right from wrong and make moral choices and judgement. It is the basic requirement for people's ethical, moral and intellectual qualities. Confucius argued that people who face facts rationally and stay true to themselves are those who truly possess the quality of wisdom (J. Zhu, 2020) .

“Faithfulness” (Xin) refers to honesty and trustworthiness. It is the moral norm that everyone should be consistent in their words and deeds, honor their promises and assume their responsibility. Confucianism regards faithfulness as a universal value. Honesty is the foundation for national governance, the universal ethical code and norms for a nation and the internalized moral belief for individuals. It is the prerequisite for winning the trust and respect of others, the internal requirement of self-improvement and the creed of a man of noble character.

When interpreting the inter-relationship between benevolence, righteousness, and propriety, Liu Kai pointed out that benevolence and propriety constitute the unity of internal and external core values of Confucianism, with benevolence more focusing on the mind and propriety more focusing on behavior. Propriety is how benevolence should be applied in practice, while righteousness is the behavioral norm linking benevolence and propriety (K. Liu, 2013).

2.2.3 The application of Confucian values in management

(1) Confucianism and corporate management

Confucianism can be used to effectively predict the work attitude and behavior of employees. Therefore, it is advisable to integrate Confucianism into the building of corporate culture and systems, and transform the classic concepts applicable to corporate development into operable management systems to guide corporate management practices (K. Liu, 2013) .

Firstly, the notion of “putting people first” should be the core value of any organization. Benevolence, as the key element of Confucianism, reflects a people-oriented philosophy and the great importance that should be attached to people in management (Y. Zheng, 2013). Companies that seek development must value the needs of employees and strive to create a corporate culture that can unleash their passion and creativity. Secondly, integrity and honesty must be put on the top of business operations. Mencius’ notion of “reflection on honesty” is a strong argument that people should understand kindness. Integrity is about honesty, trust and the beauty of personality. Kindness means the sense of right and wrong, the sense of reverence, the sense of commiseration, and the sense of shame. As mentioned before, Confucianism also advocates integrity and companies should regard it as the basic principle and number one rule in business operations. Thirdly, the notion of “righteousness outweighing profits” should be the business philosophy. Righteousness and profit are core elements of Confucianism, which advocates righteousness before profit, and advises against succumbing to the temptations of greed . Fourthly, the doctrine of the golden mean should be the guideline for decision-making. The golden mean does not equal to making a compromise but refers to a standard for making judgement (Q. Zhou, 2004). Companies should take a modest and impartial approach when making decisions and act in accordance with objective laws, minimizing the occurrence of extreme actions (D. Xie, 2016). Fifthly, the notion of “governance with ethical principles” should be applied to corporate management. This notion is a seminal idea in national governance Confucianism, which argues that if rulers can discipline themselves with morality and virtue, people will stay together around them towards the right direction just like stars revolve around the North Star (Y. Xu, 2006). Therefore, managers should strengthen their moral and ethical cultivation, should lead by example, and serve as a role model for other employees.

(2) Confucianism and human resource management

Confucianism contains a wealth of ideas on human resource management. The Confucian political proposition of benevolent governance is in essence about managing people (X. Wang, 2003), because people are at the center of self and social management. Research on human resource management under the realm of Confucianism has mainly focused on the following aspects in recent years:

Firstly, on knowing people – Confucius proposed the “Nine Signs of Appreciation of

People”, as follows: (i) send him out of your sight to observe his loyalty; (ii) stay close to him to see if he is still respectful; (iii) leave complicated and challenging jobs to him to observe his competence; (iv) ask him questions unexpectedly to test his knowledge and ways of thinking; (v) give him urgent matters and set a deadline to test his trustworthiness; (vi) ask him to manage financial affairs to see if he is clean, honest and incorruptible; (vii) inform him of dangers to observe his integrity, principles and courage; (viii) observe his behavior when he gets drunk; (ix) let him get along with people of the opposite sex and different classes to examine his ability to handle interpersonal relationships through his facial expressions.

Secondly, on selecting qualified talents – Confucius believed that when selecting talents, one should focus on their essential quality, rather than expect them to be perfect in every aspect. In turn, Mencius stressed that those who have high prestige and have stood the test of time can be assigned with important tasks while Xunzi held that the selection of talents should be based on merit, without the influence of external relationships. Enemies or relatives, those who have competence and virtue should be chosen (X. Zhao, 2012). This tells that when recruiting talents, corporate managers must take a full range of considerations and assess both their competence and virtue, without neglecting either of them.

Thirdly, on appointing talents – Confucianism advocates that the prerequisite for appointment is to make sure the candidate is upright and honest and then appoint him to a position compatible with his specialties and characteristics. Making sure to hire the person you trust and trust the person you hire is the way to treat your subordinates (X. Zhao, 2012).

Fourthly, on training talents – Confucianism believes that people’s innate qualities are similar in nature, and their differences gradually become apparent in the acquired learning process. Thus, education has an important influence on human development and managers must continue to learn, and update their knowledge, so that they can transfer it to other employees and serve as a role model of continuous learning (C. Liu, 2014).

Fifthly, on talent retention – Confucianism believes that some key points to retain talents include the following: a harmonious working atmosphere and relationship between superiors and subordinates and among colleagues; equal stress on institutional constraints and flexible management; proper incentives that combine material rewards and psychological motivation. (K. Liu, 2013).

(3) Confucianism and the core socialist values

The core socialist values are based on the development of fine traditional Chinese culture, the main part of which is Confucianism. In this sense, Confucianism is the philosophical origin of the core socialist values Y. Yu (2017) and L. Zhao (2014) pointed out that Confucianism

contains the vision of building a strong and prosperous nation, the pursuit of fairness and justice, and the value orientation of integrity and friendship. The core values of socialism have highlighted such value propositions as putting people first, harmony and integrity advocated in Confucianism, casting modern implications to this traditional value system.

Bao (2014) also argues that the core values of socialism can find their theoretical origin in Confucianism since it advocates the harmony between man and nature, man and himself, man and man, and man and society, providing value objectives for the core values of socialism. Advocating propriety as the basic system of social development, Confucianism offers the value orientation for the core values of socialism; valuing honesty and trust in interpersonal relationships, Confucianism provides the value principles for the core values of socialism.

Y. Pi (2016) systematically reviewed the ideas of benevolence, people-orientation, integrity, justice, peace and harmony in Confucianism, and the core values of socialism to reveal the intrinsic connection between the two. The researcher proposed that with the principle of putting people first, the way of life as the basis and cultural identity as the path, the core values of socialism can be cultivated and practiced as an updated version of Confucianism in modern times.

X. Liu (2018) pointed out that the notion of self-cultivation in Confucianism centers around benevolence, righteousness and propriety, which extends to such moral ideas as caring for your home as well as your homeland, putting justice before profits, unreserved sincerity and kindness and harmonious coexistence. These ideas reflect the same aspiration as the value propositions of core values of socialism, which have transcended the original notion of self-cultivation in Confucianism in terms of democracy, rule of law, freedom, and equality.

(4) Confucianism and Mental Health

Luo (2020) stated that, as the mainstream culture of Chinese society, Confucianism has the function of characterizing, constructing, guiding and evoking mental health services. Confucianism is a useful guide for improving personality, enhancing psychological traits, and handling frustration.

Shi (2013) believes that Confucian culture contains a wealth of ideas for coping with stress, including the source of stress, the basis for coping with stress, and methods to tackle stress. From the perspective of Confucianism, people feel pressure due to insufficient personal cultivation. Confucianism regards ideal personality as the basis for coping with pressure and believes that pressure will disappear naturally once the ideal personality is accomplished. In what concerns self-motivation, J. Zhou (2014) conducted a research on Chinese students overseas and found that Confucian cultural beliefs such as resilience, hard work, interdependent

relationships, and filial piety are the sources for Chinese students to persist in studying hard abroad.

J. Zhang (2009) used the Confucian Traditional Values Scale and SCL-90 to conduct a group test at universities. The results of the study showed that Confucian traditional values are appreciated by college students in this order according to their average scores: unity and harmony > familism > humility and discipline > diligence and resilience > face-saving relationships. Another conclusion of the study is that the stronger the traditional Confucian values, the higher the level of mental health.

2.2.4 Measurement of Confucian values

Different researchers have attempted to measure traditional Confucian values. According to Rokeach (1973) the value system that people have is a continuum of the degree of importance. There are two types of values: terminal values and instrumental values. Terminal values reflect people's expectations of the terminal state and results, while instrumental values, mainly reflected in personal morality and ability, are instrumental means or methods people adopted to achieve the terminal state. Based on this theory, Rokeach built the Values Survey (RVS), where respondents rank the two value systems from the most important to the least. This scale can effectively measure the differences in the values of employees and reflect the systematization and integrity of values.

As one of the first researchers to raise the "post-Confucian hypothesis" Kahn (1979) argued that Confucian ideology is the main reason for the economic take-off of the four tigers in East Asia (Taiwan, Hong Kong, Singapore, South Korea). There are four characteristics of Confucian ideology that have an important influence on the development of East Asian enterprises: (1) familism, which means that individuals must be loyal to their family with a sacred sense of mission; (2) the tendency to help the group identity; (3) the sense of class, which is believed to be natural and reasonable; (4) complementary interpersonal relationships, which means the subordinates obey the superiors, and the superiors take care of the subordinates (Y. Zhang, 2003).

Redding believes that post-Confucian ethics is mainly shaped by factors such as family socialization, education, norms of social roles, organizational socialization, and language. The psychological connotations of post-Confucianism include: self-discipline and temperance, respect for education, emphasis on acquiring skills, hard work, family responsibility, social reciprocity, money consciousness, groups of identity, the sense of class, face-saving, recognition of the tradition, and family's ownership of business (J. Zhao, 2018).

G. Hofstede and Bond (1988) tried to explore the reasons for the rapid economic development of East Asia from a cultural perspective. They designed a scale to measure the values of the Chinese based on the traditional values of Confucianism, which include the dimensions of morality, benevolence, and moral restraint. They conducted an empirical research in 22 countries including the Chinese Mainland, South Korea, Japan, and the Netherlands, and concluded with the theory of Confucian Dynamism, which includes eight values: persistence, ordering relationships by status and observing this order, thrift, having a sense of shame, personal steadiness and stability, protecting your face, respect for tradition, and reciprocation of greetings, favors and gifts. The research findings have enriched Hofstede's culture model with the fifth dimension, long-term orientation (LTO) that was mentioned before.

(2) Confucian Values Measurement Scale in China

Taiwan scholar Yang (2004) developed a scale of the core values of Chinese traditional culture with practical significance. With a total of 40 statements, the scale measures the importance of values in daily life as perceived by respondents and concludes that traditional Confucian values are composed of five factors: familism, humility, face saving, unity and harmony, and diligence. Performance and organizational commitment have an important impact (C. Zhu & Chen, 2020).

According to Huang (1995), Confucianism is composed of three parts: benevolence, self-cultivation, and helping others. He designed a scale on values with 63 items whereby respondents are asked to rate the importance of the items not only to themselves, but also to their previous generation. The score of each item ranges from -5 to +5, the former meaning very unimportant and the latter very important. The higher the score, the greater the importance. Factor analysis was used to analyze the data, the results of which indicated that traditional values and modern values have merged into a new value system, serving as the psychological driver for the creative transformation of Confucianism.

Based on interviews, Jin (2009) developed a Chinese Values Scale containing 47 items related to people's way of life. The results of the empirical research of different types of respondents from 12 provinces, municipalities, and autonomous regions across China showed that contemporary Chinese values include eight dimensions, namely: money and power; family orientation; ethics and self-discipline; law-abiding and conformity; competence and pragmatism; reputation and achievement; human relationships; and emotion. Q. Wang and Zhang (2012) analyzed the content and dimensions of traditional Confucian values at workplace, and believed that such values, with harmonious relationship at the core, include four dimensions, namely respect and compliance to authorities, tolerance and altruism, acceptance of authorities,

and face. This author designed the Confucian Traditional Values at Workplace Scale with 4 dimensions and 23 items to study the predictive ability of Confucian traditional values at workplace on employee organizational behavior from the perspective of equity sensitivity and organizational citizenship behavior. The empirical research found that traditional Confucian values at workplace can well predict the behavior and equity sensitivity of employees, and that the values are individually specific. G. Yu et al. (2016) adopted a localized research paradigm, that is, to study the values of the Chinese people through their expression habits, which offer a new perspective on the research of Chinese people's values. This researcher designed the Chinese Values Instrument (CVI-II) with 7 value orientations and 28 items. The 7 value orientations are social harmony, benevolence and trust, fairness and justice, family happiness, physical and mental fitness, career prosperity, and open mindedness and innovation. The 7 dimensions form a three-layered Chinese value system, which are categorized into integrative and adaptive values, and further separated into four categories: group-based integration, self-based integration, group-based adaptation and self-based adaptation.

2.3 Literature review on employee satisfaction

Since the 1950s, with the development of knowledge-intensive industries, human resources have played an increasingly important role in organizing daily production and business activities. The competition among enterprises to some extent has become the competition for human resources, which leads to the growing focus on employee job satisfaction.

2.3.1 The definition of employee satisfaction

In 1935, the American scholar Hoppock (1935), one of the first to study employee satisfaction, raised the term in his book *Job Satisfaction*. According to him, employee satisfaction is the level of psychological and physical satisfaction of employees on the environmental factors, which is their feelings or subjective reaction to the working situation. Hoppock's work is the basis for later research and many studies followed. For example, Vroom (1964) believed that employee satisfaction is the degree of alignment between the actual feelings obtained from work and the self-expectations generated from subjective consciousness. Porter et al. (1968) defined employee satisfaction as the different psychological states of employees in response to their salary levels. Smith et al. (1969) believed that satisfaction is the employee's feelings about the work environment, which is the result of the gap between the actual remuneration and his/her expected deserved value. The smaller the gap, the higher the satisfaction; the larger the

gap, the lower the satisfaction. For Locke (1969), employee satisfaction is a positive psychological tendency, which originates from the recognition of the employee's work value and reflects the employee's subjective emotions. The pleasant emotion an employee experiences, when recognized, is employee satisfaction. Hackman and Oldham (1975) believed that employees can get a sense of satisfaction at work, which can motivate them to work for the organization. When an employee's remuneration and development prospects in the organization meet or exceed their expectations, employees will obtain a high degree of satisfaction. Milbourn and Dunn (1976) defined employee satisfaction as employees' emotional perception of their job, salary level, promotion opportunities, leadership, and colleagues. Kalleberg (1977) argued that employee satisfaction reflects the importance of an employee's role at work. Milbourn and Weiss (2003) defined employee satisfaction as the positive or negative evaluation of employees on their own work or work status.

Chinese scholars have also made useful explorations on the subject of employee job satisfaction. Bai et al. (2002) allege that employee satisfaction is relative to the individual's life satisfaction and overall satisfaction, and specifically refers to the individual's satisfaction as a professional. It is an evaluation made after the comparison between the expected salary and environment and the actual situation. C. Huang and Xing (2002) believe that employee satisfaction is relative to the individual's life satisfaction and overall satisfaction, and specifically refers to the individual's satisfaction as a professional, the degree of which is based on a comparison between the level of compensation and the working environment. Y. Liu (2004) defined employee satisfaction as the degree of a pleasant feeling that employees feel when the work itself can satisfy or help to meet their own work values. L. Zhang and Zhou (2005) believe that employee satisfaction is the result of employee's attempts to explain various work-related characteristics. This research is primarily about the level of influence of certain contextual factors on job satisfaction. W. Zhang (2011) defined employee satisfaction as the attitude and perception of employees about their work and working environment, which is a function of employee expectations. Y. Li (2016) pointed out that employee satisfaction is an index used to measure the difference between employees' expectations and the perceived effect of the company. It is a manifestation of individual subjective value judgments. More recently, Feng (2020) proposed that employee satisfaction is the degree to which employees' expectations or requirements are met and is the result of a comprehensive judgment of various factors in the enterprise.

Based on the definition of employee satisfaction by domestic and foreign scholars, we can see that employee satisfaction is a complex concept containing internal and external factors

(Che, 2021). It is therefore difficult to define a universally applicable concept of employee job satisfaction. However, all researchers recognize that it is a subjective feeling, which reflects the employees' evaluation of their satisfaction with the work.

According to An (2006), the different viewpoints can be divided into three types. The first is the “comprehensive type”, which defines employee satisfaction from a holistic perspective, as an overall attitude towards the work itself and the work environment and does not involve the composition or the causes for such satisfaction. The second is the “factor type”, which believes that employee satisfaction is the aggregate of multiple factors depending on individuals' cognitive evaluation and emotional response to their work. The third is the “cause type”, which focuses on the reasons that cause employee satisfaction based on motivation theories, although researchers differ in their perspectives on the causes.

2.3.2 Theoretical basis of employee satisfaction

The definitions of employee satisfaction suggest that it has a high positive correlation with the extent to which employees' needs are met. Research often links it with motivation theory, which can serve as a theoretical basis and research perspective for employee satisfaction (M. Li, 2016).

Motivation theory can be divided into four categories: process-based, content-based, behavioral transformation, and the motivation theory of a holistic approach. The process-based supplements the psychological process from the generation of motivation to the taking of actions while the content-based aims to find out the specific factors that motivate employees to work hard mainly studying people's needs and the way to meet them. It focuses on the perspectives and ways of motivating employees, but does not specifically describe the motivation process. Behavioral transformational motivation theory mainly studies the shaping and transformation of people's behaviors so that they can develop in the same direction as expected by the organization (P. Li, 2018; Y. Liu, 2013). Content-based, process-based, and behavioral transformation motivation theories explore how to improve employees' job motivation and satisfaction from different perspectives. Motivation is a complicated process, and the research on motivation from a single perspective inevitably has some limitations. The holistic approach motivation theory integrates all three types of theories and describes the whole process of motivation in a more systematic manner (P. Li, 2018). In this section, some typical motivation theories will be discussed.

(1) Maslow's hierarchy of needs

In 1943, the American humanistic psychologist Abraham Maslow proposed the hierarchy of needs theory in his book *A Theory of Human Motivation*. The theory has three basic

assumptions that can be applied to job satisfaction: first, only unmet needs can be used to influence employees' behavior while satisfied needs cannot be used as motivating tools; second, people's needs can be placed in a certain order according to their importance and levels on the hierarchy; third, people will not address the needs on the next level until those at a lower level are satisfied. The continuous pursuit of higher-level needs becomes a motivation for employees to work hard (B. Zhao, 2016) .

According to Maslow human needs can be divided into five levels: from bottom to top are physiological needs, safety and security, love and belonging, self-esteem, and self-actualization. Later, Maslow expanded the hierarchy to a seven-level pyramid by adding cognitive needs and aesthetic needs between self-esteem and self-actualization (Maslow, 1981; X. Xu, 2013). Physiological needs refer to the most basic needs of people to maintain survival, such as clothing, food, shelter, and transportation. Once met, people will address the needs on the next level, which refers to the needs to ensure personal safety, property security, work safety, and life stability, and to stay away from disasters, threats, and physical and mental harms. When safety and security needs are met, people will pursue the needs for belonging and love, which are emotional needs. The needs for love show that people want to establish a harmonious relationship with their friends and colleagues, maintain friendship and loyalty, and aspire to love and be loved. The needs for belonging mean that people want to pursue a sense of belonging, eager to be a member of a community, and take care of each other (Z. Liu, 1998). Esteem includes internal respect (self-esteem) and external respect from others. Generally speaking, the need for respect is rarely met, but if so, it will become a lasting motivation for employees. The need for self-actualization is the highest-level need. It refers to people's pursuit of their ideals and ambitions so that their talents and potential can be fully utilized. For most people, self-actualization is a goal that only a very small number of people can achieve (Y. Li, 2021; Y. Liu, 2013). Cognitive needs, refer to the needs of employees to explore and understand themselves and the world surrounding them, and to solve problems. Aesthetic needs refer to the psychological satisfaction from the pursuit of symmetry, uniformity, harmony, brightness, beauty and other qualities (X. Xu, 2013). Transcendence needs mean that a person is motivated by values that go beyond the personal self and are often understood self-actualization needs.

The hierarchy of needs theory received a great response and huge attention from the academic community. Although it attaches importance to the realization of self-value and inner potential (Y. Zhang, 1994), some scholars argue that there is a humanistic flaw in the hierarchy of needs theory, since it ignores the decisive role of social factors in the growth of people. Some scholars believe that the theory's stress on level-by-level move up on the needs pyramid can be

too rigid and even mechanical, and that it over-emphasizes the vertical link among different levels of needs while ignoring the possibility that people may have multiple levels of needs at one given point (Z. Wang, 2013).

(2) Two-factor theory

In the late 1950s, the American psychologist Herzberg and others conducted investigations in enterprises and found factors that affect employees' work enthusiasm. One is related to the work itself and the other is related to the working environment. These factors were sorted and summarized to propose the motivation-hygiene factor theory, known as the two-factor theory (Herzberg et al., 1959), according to which external factors such as company policies, management practices, supervision, salary, interpersonal relationships, and working conditions are highly related to job dissatisfaction. Such factors are referred to as hygiene factors (X. Wang et al., 2018). It has also been found that work achievements, recognition and compliments on work performance, intrinsic interest in the work, responsibility, work advancement and other factors related to the work itself are positively correlated with employee satisfaction and are referred to as motivation factors. Hygiene factors and motivation factors play different roles in stimulating employees' work enthusiasm, but there is no clear boundary between the two and they can be transformed into each other (Z. Wang, 2013).

Based on the analysis of the two-factor theory, Herzberg et al. (1959) proposed a binary continuum, that is, the opposite of "satisfaction" is "not satisfaction", and the opposite of "dissatisfaction" is "no dissatisfaction" (Y. Liu, 2013). If managers fail to satisfy hygiene factors, employees will be slack and passive at work. While improving these external factors can eliminate employees' dissatisfaction and comfort their emotions, it will not increase their satisfaction, nor will it improve work enthusiasm or productivity. However, if managers improve motivation factors, employee satisfaction will increase significantly.

The two-factor theory is of great significance in mobilizing employees' work enthusiasm and increasing productivity. In order to arouse employees' work enthusiasm, it is necessary for managers to combine the external factors such as working condition improvement and better working atmosphere and internal factors such as interest in the work and career development opportunities. However, it also has limitations, including lack of credibility of empirical research methods and limited theoretical scope (X. Wang et al., 2018).

(3) McClelland Achievement Motivation Theory

McClelland, a former psychologist at Harvard University posited that when people's basic needs are met, their higher-level needs can be divided into the need for achievement, the need for affiliation, and the need for power. These three kinds of needs have different levels of

importance in the structure of individual needs since they will make greater efforts to meet their primary needs (J. Li et al., 2016; McClelland, 1975, 1995). The need for achievement refers to the internal drive for achieving success and pursuing excellence. People with a high level of need for achievement have a strong desire for career success and are willing to accept challenges and rise to them, have a strong crave for career success, are enterprising and ready to take responsibility and risks. For them, achievement is more important than money, which is a mere tool to measure progress and achievement. They set goals that can be achieved with effort before engaging in a challenging job and need a clear and uninterrupted feedback on work achievement to know if it has been recognized by the organization or others (McClelland, 1975). The need for power refers to the individuals' desire to gain a certain position in an organization and to influence or control others without being controlled. They enjoy competitive work and pursue outstanding achievements to gain power and status and hope to make their voices heard in the team and their views valued by others (X. Qin, 2016). As a basic social need, the need for affiliation refers to the need to establish friendly and harmonious interpersonal relationships with others. People with the need for affiliation are typically eager to establish friendship with others at work and hope to work in a cooperative environment. Employees with a high level of need for affiliation value communication, friendship, cooperation, and mutual understanding among colleagues (J. Li et al., 2016).

McClelland motivation theory has important significance for management. For example, managers should assign challenging and risky jobs to the employees with a high level of need for achievement to stimulate their work enthusiasm and routine jobs to those with a low level of need for achievement (L. Liu, 2017; Y. Liu, 2013).

(4) Expectancy theory

In 1964, American behaviorist Vroom (1964) elaborated on the expectancy theory in his book *Work and Motivation*. Expectancy theory (Y. Liu, 2013; Z. Liu, 2018) reflects the relationship between needs and goals through three factors: motivation, valence, and expectancy. It can be expressed by the following formula: $\text{motivation} = \text{valence} \times \text{expectancy}$, or $M = \sum V \times E$, where motivation refers to the driving power for individual behavioral motivation, reflecting the degree of efforts to achieve the goal; expectancy refers to the probability of achieving the expected result through one's own efforts; valence refers to an individual's subjective estimation and judgment of the utility value of a certain result, which measures the extent of satisfaction of an individual's needs after achieving a certain goal. According to the formula, the level of motivation is closely related to valence and expectancy.

Motivation is affected by other factors such as instrumentality, which is added to the

motivation formula. Instrumentality refers to the relationship between work achievement and reward, with value ranging between -1 and 1 (Yuan, 2018). According to the expectancy theory, employees will only be motivated if they believe that high-performance work can bring desired results to themselves. When good results are adequately rewarded, there is a high level of instrumentality and motivation, and vice versa (Fan, 2013). The motivation formula can be transformed into $\text{motivation} = \text{valence} \times \text{expectancy} \times \text{instrumentality}$, or, $M = E \times V \times I$.

To maximize the motivation, Vroom proposed an expectancy model to further sort out the relationship between personal efforts, personal performance, organizational rewards, and personal needs, and provide an operational path to realize motivation.

Three layers of logic can be drawn from the expectancy model. Firstly, the relationship between efforts and performance, that is, the higher the probability that an individual will attain the corresponding performance after efforts, the greater the motivation. The achievement of corresponding performance includes two parts: whether one could achieve the expected objectives through efforts and whether such achievement could be properly and fairly evaluated. Secondly, the relationship between performance and organizational rewards, which refers to the expectation between the work performance achieved by the employee through efforts and the rewards he or she receives. Thirdly, the relationship between organizational rewards and personal needs, which is the degree of conformity between the organizational rewards obtained by individuals and personal needs (Z. Liu, 2018). The expectancy theory emphasizes that the probability of employees' targeting valence and expectancy varies from person to person, and is dynamic in response to individual's changing cognition level and values. It objectively reflects the nature of psychological activities and explains in detail the process of motivation, and therefore has important significance for corporate managers (Y. Liu, 2013).

2.4 Research on organizational culture, Confucian traditional values at workplace, and employee satisfaction

Q. Wang and Zhang (2012) analyzed and defined the connotation and dimensions of Confucian traditional values at workplace and designed a scale for this variable. The research results show that Confucian traditional values at workplace can well predict employee behavior. Ma (2016) analyzed the mechanism of the relationship between Confucian traditional values at workplace and organizational citizenship behavior and constructed a theoretical model with Confucian traditional values at workplace as the independent variable, impression management motivation and superior-subordinate relationship as the mediating variables and organizational citizenship

behavior as the dependent variable. Wei (2016) pointed out that organizational culture has an important influence on employees' work values, and that clan-based culture, innovation-prone culture and market-based culture have significant and positive impacts on employees' objective and instrumental values, while hierarchical culture has a significant and negative impact on employees' objectives and instrumental values.

Through a questionnaire survey H. Li (2020) found that five factors in organizational culture, namely interpersonal harmony, open innovation, competitive efficiency, short-term results, and strict control, have positive impacts on employee satisfaction. Chen (2017) conducted an empirical study on employees born after 1985, which showed that participatory and consistent corporate culture has a positive impact on employee satisfaction. To Y. Li (2016) organizational culture is an important indicator of employee satisfaction. His empirical research found that the eight dimensions of organizational culture (teamwork, social responsibility, learning and innovation, standardized management, organizational identity, mission and vision, employee orientation, and customer orientation), all have significant positive correlations with employee satisfaction.

In sum, extant research on organizational culture, Confucian traditional values at workplace, and employee satisfaction has yielded some results but still has some limitations especially because, in what concerns Confucian values it is mainly descriptive and, to our best knowledge it has not been related to job satisfaction, nor to the role that organizational culture plays in that relationship.

2.5 Theoretical model and research hypotheses

2.5.1 Theoretical model construction

Based on the literature review on organizational culture, traditional Confucian values at workplace, and employee satisfaction and their relationships, this study proposes a theoretical framework as shown in Figure 2.1:

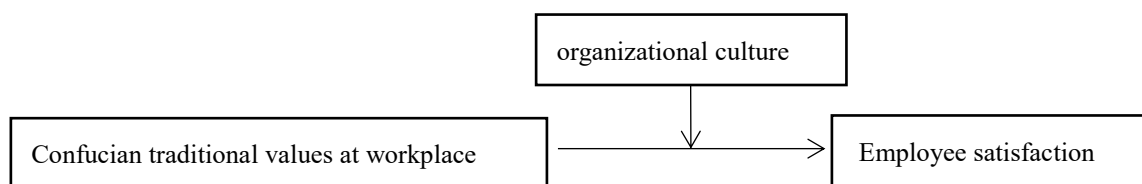


Figure 2.1 Theoretical model

In the theoretical model, and drawing from the literature, organizational culture is composed of four dimensions: involvement, consistency, adaptability and mission. Confucian

traditional values at workplace consists of four dimensions: tolerance and altruism, respect and compliance with authority, acceptance of authority and face. This research does not focus on the detailed structure of employee satisfaction but regards it as a holistic subject. The purpose is to explore whether and how organizational culture plays a moderating role between Confucian traditional values at workplace and employee satisfaction. It is therefore necessary to further analyze how the four dimensions of organizational culture, namely involvement, consistency, adaptability and mission, moderate the relationship between Confucian traditional values at workplace and employee satisfaction.

2.5.2 Research hypotheses

(1) The relationship between Confucian traditional values at workplace and employee satisfaction

As it was thoroughly discussed in previous sections, Confucianism is the mainstream of Chinese traditional culture. It is inclusive of other schools of thought and has an important role in shaping the values of Chinese people. The connotation of Confucian traditional values can be analyzed from two perspectives. One is to regard them as a moral system. Confucianism advocates “the Three Cardinal Guides (the ruler guides the subject, the father guides the son, and the husband guides the wife) and “the Five Constant Virtues” (benevolence, righteousness, propriety, wisdom, and faithfulness) as the ethical code and behavioral norms between people. The other perspective views Confucian traditional values as a relational system, a philosophy about harmony. Benevolence (ren), the core of Confucianism emphasizes harmonious and stable relationships, according to which people should not only love their parents and themselves, but also those around them, achieving a state of universal love (Q. Wang & Zhang, 2012; X. Ma, 2016). In addition, Confucianism advocates “not do to others what you do not want others to do to you”, and “exercise strict self-discipline and be lenient to others”, requiring people not to impose their own ideas on others, to be open and tolerant and avoid conflicts (Q. Wang & Zhang, 2012). Under the influence of Confucianism, people usually pay more attention to the impressions they leave on others, and are eager to win reputation, respect, care, and fair treatment. They even tend to sacrifice their personal interests to avoid conflicts in interpersonal relationships. Confucianism puts forward the “five cardinal relationships”, namely kinship between father and son, loyalty between emperor and minister, different roles between husband and wife, priority of the elder over the younger and trustworthiness among friends. These five relationships imply superiority and inferiority except the one referring to friends, and have more specific and authoritarian prescriptions of the responsibilities, obligations and behavioral norms

of the lower groups. According to the requirements of the “five cardinal relationships”, the lower one in the pair must respect and obey his superior counterpart, which in the long run, will make them become accustomed to being led and commanded by others (Q. Wang & Zhang, 2012).

Confucianism provides the standards and codes of conduct for interpersonal relationships and has an important influence on the attitude and behavior of employees. Confucian traditional values at workplace manifest themselves in that employees value their harmonious relationships with the organization and its members, actively take the needs and expectations of others into consideration, avoid causing trouble for others, pay attention to the impact of their actions on their colleagues, try to be tolerant and accommodative, try hard to preserve and improve their self-reputation and that of their colleagues and the organization, and respect and accept the decisions made by the organization and leaders as much as possible. Employee satisfaction is the emotional cognition of the work itself and of the work environment. It contains many factors and is the result of their combined effect. From the above analysis, the following hypothesis can be proposed:

H1: Confucian traditional values at workplace have a positive effect on employee satisfaction.

(2) The relationship between organizational culture and employee satisfaction

A relatively mature organization pays attention to the changes in the internal and external environment, and continuously improves its adaptability. Such organizations will implement reforms and employee training in response to the changing environment. At the same time, they tend to capture the information from the market and customers in a timely manner, and continuously satisfy their needs. The work done by employees is challenging and innovative, contributing to the realization of employees' self-value and a high degree of satisfaction.

Organizations often formulate strategic goals for their development, as well as a series of short-term, mid-term, and long-term objectives for achieving strategic goals, which serve as references for employees' work. When the organization's strategic goals are recognized by employees, they will formulate compatible personal development goals and have a clear idea of how they can contribute to the realization of the organization's goals. When these are continuously achieved, employees will continue to have their needs at all levels satisfied, which will also produce higher degree of satisfaction.

Organizational culture is the embodiment of the core values of an organization. Once employees agree with them, they will generate a strong power of cohesion and sense of unity on behalf of the organization, and they will have the confidence to achieve organizational goals.

Even if they have different opinions on key issues, they will manage to reach consensus and carry out close and effective cross-departmental communication and collaboration for the realization of organizational goals.

When the leaders delegate power to employees and allow them to actively participate in organizational management, employees will feel recognition and a sense of value and belonging, which will then translate into higher job satisfaction and more hard-working attitude. Traditional Chinese values cherish collectivism, which nurtures a working atmosphere of mutual help and teamwork. In such an environment, it is easier to achieve work goals, and employees tend to have higher satisfaction. Since human resources are the most important resource for organizational development, companies will encourage innovation, focus on creating an innovative and challenging work atmosphere, invest resources in employee development, and meet the needs of employees to improve their skills and achieve their value.

Based on the above analysis and on the four dimensions of organizational culture that have been discussed, this research proposes the following hypotheses:

H2: Involvement can moderate the positive relationship between Confucian traditional values at workplace and employee satisfaction.

H3: Consistency can moderate the positive relationship between Confucian traditional values at workplace and employee satisfaction.

H4: Adaptability can moderate the positive relationship between Confucian traditional values at workplace and employee satisfaction.

H5: Mission can moderate the positive relationship between Confucian traditional values at workplace and employee satisfaction.

2.6 Summary of this chapter

This chapter reviews the existing research on organizational culture, Confucian traditional values at workplace, and employee satisfaction. Firstly, it describes the definition, model, and measurement of organizational culture; secondly, it describes the development and content of traditional Confucian values, and its application in management; thirdly, it reviews the definition and theoretical basis of employee satisfaction, describes the representative motivation theories and elaborates the relationship between organizational culture, Confucian traditional values at workplace, and employee satisfaction. Finally, the theoretical model and hypotheses of this research are proposed.

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Chapter 3: Research Design and Methods

In the previous chapter a literature review on organizational culture, Confucian traditional values at workplace, and employee satisfaction was conducted to form a basis for the research in this thesis and allow a better understanding of the relationships among these constructs. We are particularly interested in understanding how these relationships play in a specific sector in China – the drug distribution sector – that is dominated by four large state-owned companies and has been subject to continuous reforms in recent years. How do these companies cope in the dynamism of the reforms? As it is widely recognized, human resources and their job satisfaction are seminal factors that contribute to company success. In these circumstances, what is the role of organizational culture specifically in the case of a society traditionally inspired by Confucian values that influence the way employees will perform their jobs?

Considering the market concentration, the sheer size of each company in the sector in China, and the nature of the “how” and “what” questions that this thesis poses, a case study approach was adopted, and within it, an empirical study based on a questionnaire survey. The company selected for the research is China Meheco Guangdong Pharmaceutical Co., Ltd., which will be described later in this chapter. As per Eisenhardt (1989) and Yin (2009), case studies investigate contemporary phenomena embodied in the case and can be used to answer both explanatory and exploratory questions. By integrating the all-round comprehension of an actual and well framed situation they allow to effectively study various processes of an organization and unveil key enterprise behaviors, occasionally unexpected, in a genuine and credible manner (P. Li & Cao, 2012).

In spite of being recognized as a useful (and much used) research method, case studies have been subject to much criticism. Verschuren (2003), for example, contends that the method is not clear enough in what concerns the object and reason for research and Van and Khan (2007) claim that the method provides poor and irregular definitions. These concerns are waived in this thesis considering the nature of the case to study which is large enough and well representative of a sector that has been equally subject to the same reforms and environmental dynamism.

This chapter will start precisely by a systematic analysis of the market environment from political, economic, social, and technical perspectives (PEST) of drug distribution companies in China with particular emphasis on China Meheco Guangdong Pharmaceutical Co., Ltd.

3.1 Political environment

Since the new medical reform in 2009, the Chinese government has strengthened its regulation on the pharmaceutical market. The reform of the pharmaceutical distribution sector can be divided into four steps: firstly, the *Opinions on Deepening the Reform of the Pharmaceutical and Healthcare System* issued by the Central Committee of the Communist Party of China and the State Council (The General Office of the CPC Central Committee and the General Office of the State Council, 2009) officially kicked off the reform of the pharmaceutical distribution sector in China, making clear that the sector should adopt market mechanisms under the government's macro-control, and that essential drugs shall be procured through public bidding and distributed in a centralized manner. The document also pointed out the necessity to reform the compensation mechanism of public hospitals and to gradually abolish the drug markup. The intensified regulation set upon the pharmaceutical industry has become the top priority of the medical reform having in view to effectively control the spiraling healthcare expenditure and reduce patients' medical expenses.

Secondly, according to authority's top-level design, county-level and urban public hospitals should completely abolish drug markups by April 2015 and July 2017, respectively. This policy has on the one hand, squeezed the profit margin of drug sales, a traditional profit generating business of hospitals, and reduced the hospital's account balance and, on the other hand, aggravated the account receivables of pharmaceutical distributors.

Thirdly, in April 2016, the General Office of the State Council issued the *Key Tasks for Deepening the Pharmaceutical and Healthcare Reform in 2016* (The General Office of the State Council of the People's Republic of China, 2016), which clearly stated that the pilot reform provinces should fully implement "two-invoice system", which means there should be only two invoices issued in the entire distribution process: one issued when a drug is sold from drug manufacturers to distributors, the other issued by distributors to hospitals. The purpose of the policy is to streamline the links in the pharmaceutical distribution process and reduce distorted drug prices, marking a substantial progress in the pharmaceutical distribution reform.

Fourthly, in January 2019, the General Office of the State Council issued the *Pilot Program on the Centralized Procurement and Use of Drugs by State Organizations* (The General Office

of the State Council of the People's Republic of China, 2019), which appointed four municipalities directly under the Central Government (Beijing, Tianjin, Shanghai, and Chongqing) and seven sub-provincial cities (Shenyang, Dalian, Guangzhou, Shenzhen, Xiamen, Chengdu and Xi'an) to pilot the centralized volume-based procurement by state organizations. Designed to lower drug prices, this volume-for-price approach takes 60%-70% of the annual drug use in all public hospitals of the pilot areas as the total estimated procurement volume and selects the drug provider with the lowest bidding price.

These escalating regulatory policies and evolving market competition have posed both challenges and opportunities to the pharmaceutical distribution sector and driven accelerated industry reshuffle and reform.

3.2 Economic environment

Both the macro and the micro (industrial) sectors will be considered below.

(1) Macro-economic environment

As a key intermediary in the pharmaceutical value chain, the pharmaceutical distribution sector has two sub-sectors: pharmaceutical wholesale and pharmaceutical retail. According to the annual statistics released by the Ministry of Commerce (2019), the total revenue of the pharmaceutical sector has been growing each year, but at a slower growth rate. The total sales of pharmaceutical products in 2019 reached RMB 2,366.7 billion yuan (app. € 295,837.5 million euros), up 8.6% year-on-year after deducting non-comparable factors, surpassing GDP's growth rate in 6.1%. This indicates a positive development momentum and a big growth potential for pharmaceutical distribution sector (see Figure 3.1).

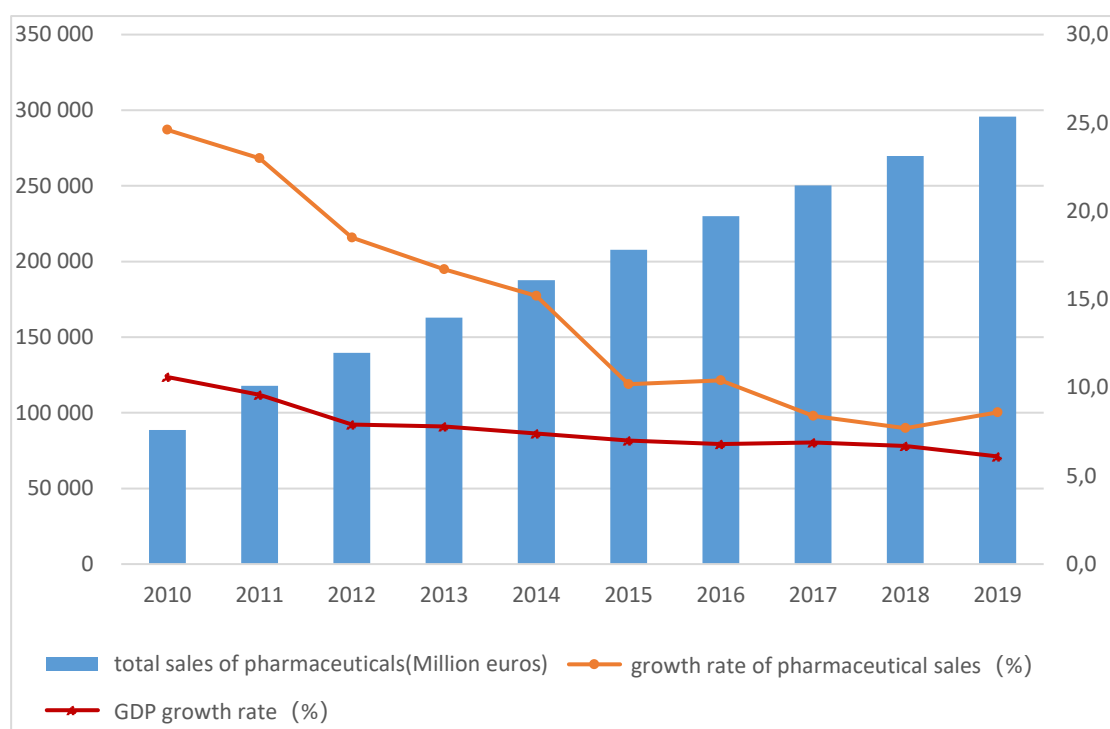


Figure 3.1 Pharmaceutical sales 2010-2018

Table 3.1 shows the performance of pharmaceutical distributors in China as a whole. From 2010 to 2019, the average gross profit margin and average expense ratio of pharmaceutical distributors' core business experienced a slow increase with some fluctuations, while the average net profit margin slowly decreased with some variations. The average gross profit margin (6.7%) and expense ratio (5.1%) were relatively low in 2013, mainly due to the increase in costs caused by industry consolidation, company size expansion, and development of new and generic drugs after the new medical reform. The relatively low average net profit margin from 2013 to 2015 was probably the result of the rollout of zero mark-up policy and the rise of e-commerce players, which further squeezed the profit margin of pharmaceutical distributors.

Table 3.1 Business performance of pharmaceutical distributors

Year	average gross profit margin	average expense ratio	average net profit margin
2010	7.6%	5.5%	2.2%
2011	7.2%	5.3%	2.2%
2012	6.9%	5.2%	1.9%
2013	6.7%	5.1%	1.7%
2014	6.8%	5.3%	1.7%
2015	6.9%	5.4%	1.7%
2016	7.0%	5.2%	1.8%
2017	7.2%	6.1%	1.7%
2018	8.2%	6.5%	1.9%
2019	8.5%	6.8%	1.7%

(2) The market environment of the pharmaceutical sector

Market concentration normally measures how concentrated the market of an industry is. It reflects the market share and competition landscape of an industry (J. Ma, 1993; Y. Hang & Tao, 2020). From the perspective of industrial economics, market concentration, on the one hand, shapes the market type and structure, and on the other hand, influences corporate strategies, corporate behaviors, and operation performance (Y. Hang & Tao, 2020). At present, there are two types of measurements of market concentration accepted by academia: the absolute measurement and the relative measurement (J. Ma, 1993). The absolute measurement directly calculates the company's market share, which reflects to which extent the market is dominated by leading players. The commonly used indexes include Concentration Ratio (CR_n) and Herfindahl-Hirschman index (HHI). The relative measurement reflects the variance degree of the sizes of industry players, whose main indicators are the Lorentz curve and the Gini coefficient, and entropy index. Through literature research (X. Hou, 2011; J. Ma, 1993), we have analyzed the main indexes of market concentration and made a brief comparison among them, as shown in Table 3.2.

Table 3.2 A comparison of indexes of market concentration

Item	Absolute measurement		Relative measurement	
	CR _n (top 4 players in the market)	HHI	Lorentz curve & Gini coefficient	entropy index
Meaning	The total market share of the top N largest companies of a certain industry	The sum of the squares of the percentage of income or asset of each firm competing in a market	The Lorentz curve is the curve formed by the cumulative percentage of enterprises; Gini coefficient is the mathematical expression of the Lorentz curve, which measures the uniformity of the enterprise's market share distribution.	Borrowing the concept of entropy in information theory, entropy index is to assign a weight to each enterprise's market share.
Formula	$CR_n = \sum_{i=1}^n \frac{X_i}{X}$	$HHI = \sum_{i=1}^N \left(\frac{X_i}{X}\right)^2 = \sum_{i=1}^N S_i^2$	$G.I = \frac{S_A}{S_B}$	$EI = \sum_{i=1}^N S_i \lg \frac{1}{S_i}$
The value range of dependent	[N/4,1]	[0,1]	[0, lgN]	[0,1]

Item	Absolute measurement		Relative measurement	
	CRn (top 4 players in the market)	HHI	Lorentz curve & Gini coefficient	entropy index
variable				
Market structure type	Oligopoly I: $CR4 \geq 85\%$	High monopoly I: $HHI \geq 0.3$	The more curved the Lorentz curve, the more uneven the distribution of enterprise size.	The larger the EI value, the lower the concentration;
	Oligopoly II: $75\% \leq CR4 < 85\%$	High monopoly II: $0.18 \leq HHI < 0.3$	Absolutely equal: $G.I \leq 0.2$	and vice versa
	Oligopoly III: $50\% \leq CR4 < 75\%$	Low monopoly III: $0.14 \leq HHI < 0.18$	fairly equal: $0.2 < G.I \leq 0.3$	
	Oligopoly IV: $35\% \leq CR4 < 50\%$	Low monopoly IV: $0.1 \leq HHI < 0.14$	Reasonable concentration: $0.3 < G.I \leq 0.4$	
	Oligopoly V: $30\% \leq CR4 < 35\%$	Competitive I: $0.05 \leq HHI < 0.1$	Fairly unequal: $0.4 < G.I \leq 0.5$	
	Competitive: $CR4 < 30$	Competitive II: $HHI < 0.05$ comprehensively reflects the distribution of players; accurately describes different concentration patterns; more sensitive to changing market shares of top players; not affected by the size and number of players.	Very unequal: $0.5 < G.I \leq 0.6$	
Merits	easy to calculate; data easy to obtain; reflects the concentration and competitiveness of the industry fairly well, widely used.		intuitive and easy to calculate; reflects how even the distribution is	sensitive to changes in market concentration.
Limitations	only reflects the industry concentration of the top players; cannot take a full view of the entire industry's distribution	High requirements for data; not easy to obtain data	complex drawings in case of numerous players; different distribution patterns may have the same Gini coefficient.	complex formula, no direct economic meaning
Applications	economic analysis for anti-monopoly	economic analysis for anti-monopoly	Less used	less used

According to the data published by the Ministry of Commerce (2018) (*2018 Statistical Analysis Report on the Operation of the Pharmaceutical Distribution Sector*), from 2010 to 2019, the key business revenue of Sinopharm, a leading Chinese pharmaceutical distributor, has consistently ranked the first in China. Its market share was 12.42% in 2010 and climbed to 18.78% in 2019, an increase of 6.36%, which makes it the fastest growing pharmaceutical distributor in the country in terms of market share (see Figure 3.2).

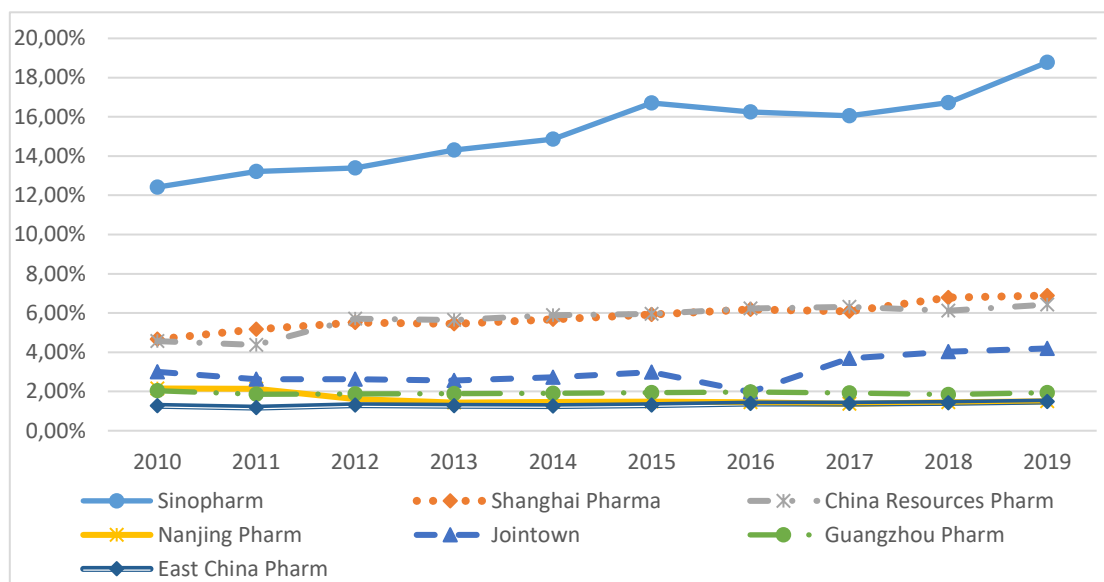


Figure 3.2 Changes in market shares of major pharmaceutical distributors in China

From the perspective of the changes in the market share, the pharmaceutical distribution sector is characterized by a low degree of monopoly, relatively low market shares by major players, and a competitive industry landscape.

According to the data released by Chinese Ministry of Commerce from 2010 to 2018, the industry concentration in China's pharmaceutical distribution sector has intensified each year since 2010, indicating a growing degree of monopoly in the sector. This is mainly due to the deepening of pharmaceutical industry reform brought by the new medical reform, which has led to growing industry consolidation. According to the classification standards made by the American consulting company Bain and the Japanese Ministry of International Trade and Industry on the market structure, China's pharmaceutical distribution sector is gradually transforming from a competitive market to a type-five oligopoly market, which means that the sector is entering the late stage of growth with growing monopolistic features and the emerging trend of oligopoly.

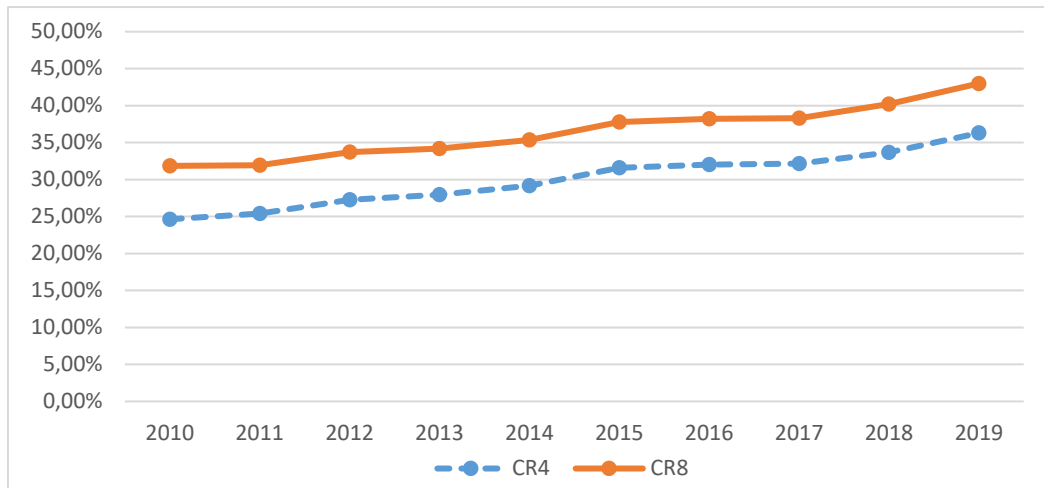


Figure 3.3 The concentration trend of china's pharmaceutical distribution sector from 2010 to 2018

In order to have a deeper understanding of the market structure of the pharmaceutical distribution sector in China, this research uses the Herfindahl-Hirschman Index (HHI) to analyze the data released by the Chinese Ministry of Commerce. As we calculate the top 4 and top 20 distributors' HHI from 2010 to 2018, we notice that their index values have been increasing over the years. In 2010, the HHI of top four distributors in terms of core business income was 0.0206, and the HHI of the top 10 was 0.0222; in 2018, the HHI values rose to 0.0379 and 0.0394 respectively (see Figure 3.4). The HHI values indicate that China's pharmaceutical distribution sector has a market structure of type-two competition, with a large number of players and a relatively small size of each player, fierce competition and a low level of market concentration.

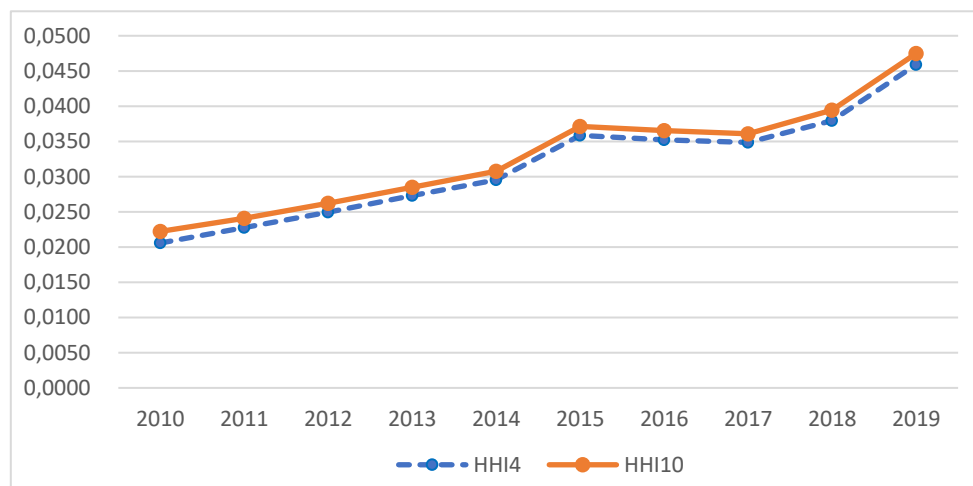


Figure 3.4 HII of top 4 and top 10 Chinese pharmaceutical distributors over the years

3.3 Social environment

(1) Growing demand for medical service driven by economic development

With the rapid economic development and social progress in China, people's living standards have been significantly improved, residents' spending power greatly enhanced, and the public awareness of healthcare have also continuously strengthened. According to the *China Health Statistics Yearbook* (The State Council Information Office, 2021), in 2019 China's resident disposable income reached RMB 30.73 million yuan (app. € 38.42 million euros, and the consumer spending was RMB 215.88 million yuan (app. € 26.99 million euros, of which medical expenses were RMB 19.02 million yuan, app. € 2.38 million euros), accounting for 8.82 %. The per capita medical expenses of urban and rural residents have been steadily increasing since 2010. In 2018, the urban resident's per capita annual consumption was RMB 26,112.3 yuan (app. 3264.04 euros, of which medical expense was 2045.7 yuan, app. €255.71 euros), accounting for 7.8%. The figures of rural residents were 12,124.3 yuan (app. € 1,515.54), 1,240.1 yuan (app. € 150.51) and 10.2% respectively, which represent a higher medical expense ratio than their urban counterparts (see Table 3.3).

Table 3.3 Chinese urban and rural residents' medical expense

Year	Urban residents			Rural residents		
	annual consumer spending per capita (Yuan)	medical expense per capita (Yuan)	medical expense ratio (%)	annual consumer spending per capita (Yuan)	medical expense per capita (Yuan)	medical expense ratio (%)
2000	4998.0	318.1	6.4	1670.1	87.6	5.2
2005	7942.9	600.9	7.6	2555.4	168.1	6.6
2010	13471.5	871.8	6.5	4381.8	326	7.4
2015	21392.4	1443.4	6.7	9222.6	846	9.2
2016	23078.9	1630.8	7.1	10129.8	929.2	9.2
2017	24445.0	1777.4	7.3	10954.5	1058.7	9.7
2018	26112.3	2045.7	7.8	12124.3	1240.1	10.2

(2) Growing demand for medical service driven by the aging population and changing disease spectrum

China has entered an aging society, and the number of elderly people continues to increase. According to the seventh national census data (National Bureau of Statistics, 2021) there are about 260 million people aged 60 or above in China, a rise of 5.44% in the past 10 years. This shows a huge elderly population and an accelerated aging process in China. With the demographic changes and improved medical standards, the spectrum of diseases is also changing, triggering more medical demands for the treatment of chronic diseases and tumors.

As more than 75% of the elderly suffer from at least one chronic disease, they are both the victims of chronic diseases and the source of demand for pharmaceuticals. Chronic diseases cannot be cured entirely and require life-long treatment thus generating urgent and large demand for healthcare services and pharmaceuticals.

3.4 Technological environment

Driven by the initiative of “Internet plus healthcare”, pharmaceutical distribution companies need to fully integrate the flows of product, logistics, data, and capital, extend to the upstream and downstream, shorten the distribution chain and days of turnover, reduce inventory volume, and improve operation efficiency (X. Su, 2020). In this context, e-commerce presents a development opportunity to pharmaceutical distributors. The internet plus approach enables distributors to communicate more effectively and efficiently through information integration and sharing. They also need to actively adopt new business modes such as smart supply chains, smart pharmacies, and public service platforms. Going intelligent in supply chain and service provision is the trend that pharmaceutical distributors have to grasp so as to boost their innovation and development with greater quality and efficiency.

3.5 Basic facts of China Meheco Guangdong Pharmaceutical Co., Ltd.

China General Technology (Group) Holding Co Ltd (Genertec Group for short) is an important state-owned backbone enterprise directly administered by the central government. Established in March 1998, it is a Fortune 500 company. The group has three core businesses, namely (1) advanced manufacturing and technical service consulting, (2) medical supplies and health care, and trade and (3) engineering contracting, which can be further divided into eight segments: equipment manufacturing, new materials, certification of medical tests and examinations, medical supplies, medical treatment, health, engineering contracting and trade. China Meheco Group Co., Ltd. (China Meheco for short) is the flagship enterprise established by Genertec Group, as well as China’s largest importer and exporter of medical and health products, and a major pharmaceutical manufacturer and supplier.

Established in 1998, China Meheco Guangdong Pharmaceutical Co Ltd. (Meheco Guangdong for short) is a core subsidiary of China Meheco, a company held by Genertec Group (see figure 3.5). Meheco Guangdong carries out the pharmaceutical, medical and healthcare businesses for China Meheco in southern China and serves as a platform and bridge for the

investment and development of other China Meheco's subsidiaries in Guangdong, a province with a population of 126 million. The business scope of Meheco Guangdong includes traditional businesses such as pharmaceuticals and medical devices distribution and wholesale, and innovative businesses such as third-party logistics, integrated supply chain services, and hemodialysis. The company covers the entire industrial chain of medical supplies and health care and provides comprehensive platform services that integrate comprehensive flow query, electronic order, and third-party logistics.

At present, Meheco Guangdong has 10 subsidiaries, which are mainly located in 10 regions including Guangzhou, Shenzhen, Foshan and Dongguan, covering most parts of Guangdong Province. The company currently has 1,100 employees and its revenue is among the industry top in Guangdong province.

Since its establishment, Meheco Guangdong has been adhering to the corporate mission of "caring for life and pursuing excellence", and committed to providing customers with efficient and value-added services. The company's business philosophy is "prudent governance and moral integrity", which means that it strives to have an efficient and effective management, aiming to treat stakeholders with trust and faith, value-creation and giving back to the society. Its service concept is "dedication, efforts, perfection, and excellence", which is embodied in the following three aspects: firstly, focusing on service innovation and the core needs of customers; secondly, providing diversified, personalized, and professional services; thirdly, providing beyond-expectation solutions and services to customers.

Meheco Guangdong is concerned with its social responsibility as an enterprise directly owned by the central government. It spares no efforts to realize its corporate value, give back to the community and the wider society, and serve the people wholeheartedly. In the fight against the COVID-19, the company was designated by the Epidemic Prevention and Control Commanding Centers of both Guangdong provincial and Guangzhou municipal governments as the reserve enterprise for epidemic prevention and control supplies, responsible for purchasing medical supplies from overseas for epidemic prevention and control. After the designation, Meheco Guangdong went all out and overcame many difficulties to purchase various medical supplies such as masks, isolation gowns, protective clothing, medical gloves, and positive pressure hoods for Guangdong province. Through providing protective supplies in a timely and reliable manner, the company has made great contribution to the battle against the pandemic as well as the resumption of business and production after the outbreak of the disease.

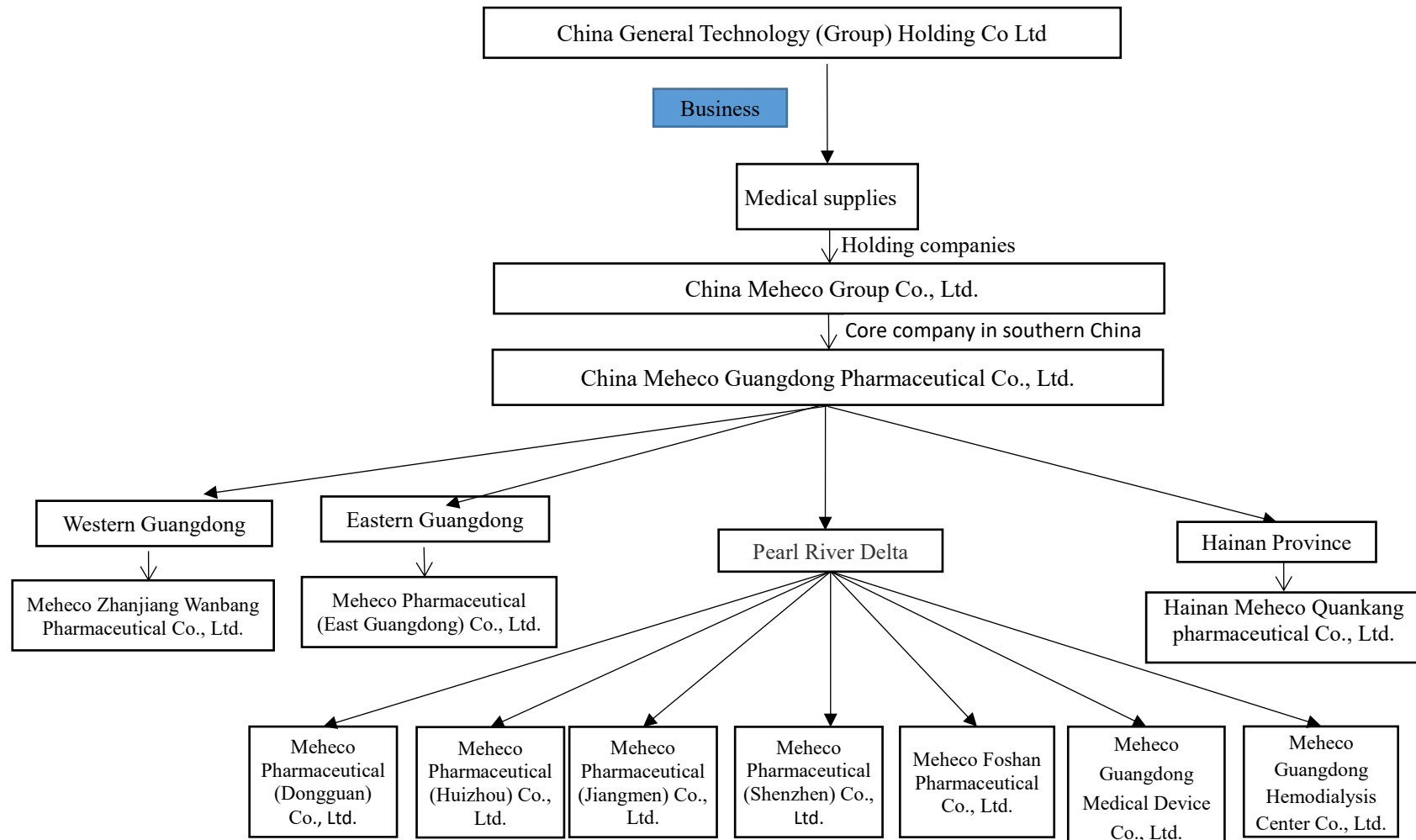


Figure 3.5 Structure of China Meheco Guangdong Pharmaceutical Co., Ltd.

3.6 Theoretical model and research hypotheses

Based on the literature review on organizational culture, Confucian traditional values at workplace, and employee satisfaction in Chapter 2, we propose a theoretical model picturing Confucian traditional values at workplace as the independent variable, employee satisfaction as the dependent variable and organizational culture as the moderator (see Figure 3.6).

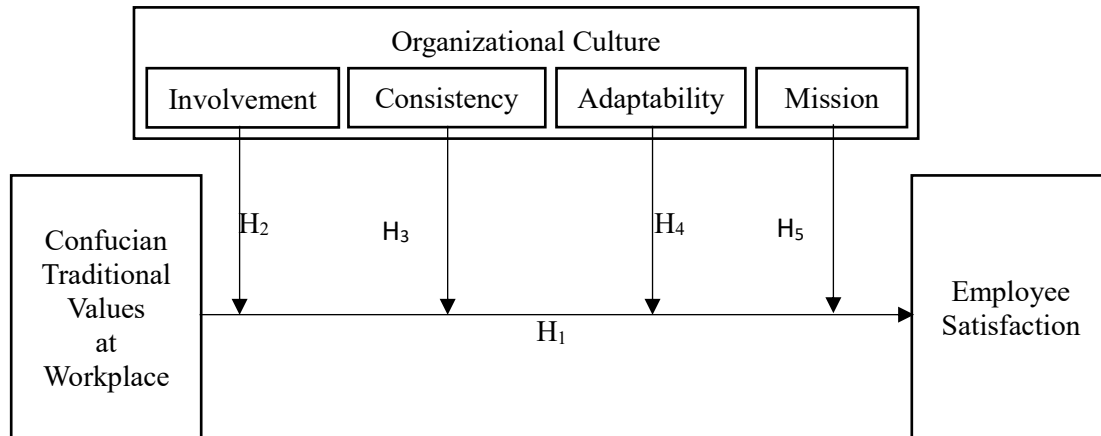


Figure 3.6 Theoretical Model

Denison's four dimensions of organizational culture consisting of involvement, consistency, adaptability, and mission (Denison & Mishra, 1995) have been widely tested in various research and are also adopted in this thesis. We are interested in finding out whether and how each of these dimensions moderates the relationship between Confucian traditional values at workplace and employee satisfaction. We will first analyze the relationship between Confucian traditional values at workplace and employee satisfaction, followed by the analysis of how the four dimensions of organizational culture (involvement, consistency, adaptability, and mission) moderate the relationship between Confucian traditional work values and employee satisfaction. Based on the research objective and theoretical model, the following hypotheses are proposed:

1. The relationship between Confucian traditional values at workplace and employee satisfaction

H1: Confucian traditional values at workplace have a positive effect on employee satisfaction.

2. The moderating role of organizational culture.

H2: Involvement can moderate the positive relationship between Confucian traditional values at workplace and employee satisfaction. The stronger the involvement, the weaker the positive effect of Confucian traditional values at workplace on employee satisfaction.

H₃: Consistency can moderate the positive relationship between Confucian traditional values at workplace and employee satisfaction. The stronger the consistency, the weaker the positive effect of Confucian traditional values at workplace on employee satisfaction.

H₄: Adaptability can moderate the positive relationship between Confucian traditional values at workplace and employee satisfaction. The stronger the adaptability, the weaker the positive effect of Confucian traditional values at workplace on employee satisfaction.

H₅: Mission can moderate the positive relationship between Confucian traditional values at workplace and employee satisfaction. The stronger the mission, the weaker the positive effect of Confucian traditional values at workplace on employee satisfaction.

3.7 Measurement and data collection

3.7.1 The selection of scales

In order to ensure the reliability and validity of the measurement tools, well-established scales already used by Chinese and foreign researchers were adopted in this research.

Specifically, the scale for the organizational culture questionnaire (OCQ) developed by Professor Denison (1995) is adopted in this research to diagnose and measure organizational culture for the following reasons: firstly, the OCQ scale is a mature and widely accepted scale after years of tests and validation; secondly, being highly practical, the scale is widely used by enterprises, organizations, and individuals. Measuring dimensions with the OCQ scale enables managers to diagnose the current situation of organizational culture and identify the key development areas and future direction. The 12 first-level indicators such as empowerment, team orientation and capability development are well allocated to the four dimensions of involvement, consistency, adaptability and mission. With a detailed and specific interpretation of organizational culture, the OCQ scale is a preferred choice for the measurement of organizational culture. The CTW (Confucian Traditional Values at Workplace) scale designed by Q. Wang and Zhang (2012) is adopted to measure Confucian traditional values at workplace. The scale analyzes and defines the content and structure of the Confucian traditional values at workplace and divides it into four dimensions: respect and compliance to authority, tolerance and altruism, acceptance of authority and face. Such interpretation reveals Confucian traditional values at workplace in an in-depth and comprehensive way.

3.7.2 The process of questionnaire survey

After translating the OCQ scale into Chinese, two professors and three students of management were invited to fine proof the scale and make sure that the meaning in the English version translated well into Chinese and could be well understood by the respondents. As no face-to-face communication was needed during the questionnaire distribution and collection, we opted for an electronic questionnaire which would be faster, more convenient, and cost-effective. Therefore, at first, the revised questionnaires were sent to Meheco Guangdong headquarters and its subsidiaries in electronic form through Wenjuanxing, an online questionnaire distribution applet.

The questionnaire design included several reverse scored items for controlling the quality and sincerity of the responses. After the electronic questionnaires were collected, the negative (reverse) indicators were processed and converted into positive indicators, and factor analysis was conducted to analyze the whole data. However, the results revealed the poor quality of the collected questionnaires as all the reverse questions had a negative correlation coefficient with the total score of other questions of the same indicator, which denoted that the respondents had failed to answer the questionnaire carefully. This was a huge drawback to the research as all the questionnaires collected had to be thrown away and the whole process had to start again.

We then decided to issue a paper-based questionnaire to be handed personally to all the respondents, one by one. The process took several weeks including the training provided to the questionnaire distribution assistants to make sure they understood the purpose of the research and were familiar with the instructions of questionnaire filling. They were then sent to the headquarters and the subsidiaries of Meheco Guangdong with the hard copies of the questionnaires. The details of data processing and results are presented in Chapter 4.

3.7.3 Statistical analysis methods

(1) Reliability and validity tests of the scales: the reliability and validity of the scales are tested through evaluating internal consistency, and confirmatory factor analysis respectively.

(2) Correlation analysis and difference analysis of the core variables in the theoretical model: Pearson simple correlation coefficient is used to measure the correlation between the core variables; two independent sample t-test, ANOVA test and multi-independent sample median test are used to conduct difference analysis of the core variables.

(3) Testing of research hypotheses and conceptual models: multiple regression analysis is used to test the effect of Confucian traditional values at workplace on employee satisfaction; hierarchical regression analysis is used to test the moderating effect of organizational culture on the relationship between Confucian traditional values at workplace and employee satisfaction.

3.8 Summary of the chapter

Based on the review and analysis of relevant literature, this chapter first analyzes the marketing environment of the pharmaceutical distribution industry in china, which shows that the organizational culture of the pharmaceutical distribution industry is a hot topic with great research significance. The chapter then introduces the basic situation of China Meheco Guangdong Pharmaceutical Co., Ltd. (Meheco Guangdong), followed by the description of research design and data collection process of the research.

Chapter 4: Data Processing and Results

This chapter presents in detail the steps taken in the data processing and the results. As a representative of the four large state-owned drug distributors in China, China Meheco Guangdong Pharmaceutical Co. Ltd. (Meheco Guangdong), headquartered in Guangzhou, was selected as the object of study including its seven subsidiaries in Guangdong Province as detailed in Table 4.1. The company employs 754 people distributed by the different companies as shown in the same table. The demographics of the respondents are shown in Table 4.2. After the descriptive statistics on the basic sample characteristics of the eight companies and the individual respondents, empirical research was carried out to test the hypotheses and the proposed theoretical model based on the sample data. This procedure was performed in three steps: first we conducted reliability and validity tests of the scales used to measure the key variables in the theoretical model, specifically organizational culture and Confucian traditional values at work place; second, to better understand the sample and the key variables, we conducted correlation analysis and difference analysis using the demographic variables and the data obtained in Meheco and its seven subsidiaries; finally we used regression to test the hypotheses proposed in the conceptual model.

4.1 Basic sample characteristics of the eight companies and the individual respondents

The sample data of the research were collected from Meheco Guangdong and seven of its ten subsidiaries (see Figure 3.5). Out of the 754 employees, 462 questionnaires were distributed based on the respondents' representativeness in terms of gender, age, and job categories. The final goal was to collect at least 50% of responses from the whole staff and, to make up for likely invalid questionnaires, we decided to distribute about 61% of the total number of employees and thus the 462. It turned out that 445 valid questionnaires were returned meaning a 96% response rate and representing 59% of the staff, which satisfied our initial target. Invalid questionnaires were rejected due to incomplete responses.

4.1.1 Basic sample characteristics of the target companies

Meheco Guangdong and its seven subsidiaries employ 754 employees and generate almost RMB 9,970 million yuan (app. €1,250 million euros) annual revenue at the time of this research. Table 4.1 is a summary of the information of the eight companies, including the number of employees, revenue, and the stage of development.

Table 4.1 Basic sample characteristics of the companies

Company Name	Employee Number	Revenue (M. yuan)	Development Stage
China Meheco Guangdong Pharmaceutical Co., Ltd.	234	6,584.56	Maturity
Meheco Pharmaceutical (Jiangmen) Co., Ltd.	27	141.33	Growth
Meheco Pharmaceutical (Huizhou) Co., Ltd.	24	134.59	Growth
Meheco Foshan Pharmaceutical Co., Ltd.	68	754.82	Maturity
Meheco Zhanjiang Wanbang Pharmaceutical Co., Ltd.	287	1,119.74	Growth
Meheco Pharmaceutical (Shenzhen) Co., Ltd.	36	205.76	Growth
Meheco Pharmaceutical (Dongguan) Co., Ltd.	20	244.32	Growth
Meheco Pharmaceutical (East Guangdong) Co., Ltd.	58	783.41	Growth

4.1.2 Basic sample characteristics of the individual respondents

As mentioned before, the questionnaire was distributed to 462 individual respondents from the above eight companies. The sample was selected from and by each company with a view to diversify the respondents' job categories, position levels, age, and gender. The diversity of the respondents is shown in Table 4.2, which describes their gender, age, educational level, years of working, employer, years of working for the current employer, job category and position level.

Table 4.2 Demographic characteristics of the respondents

Demographic Category	n	% of sample
Gender		
Male	169	38.0
Female	276	62.0
Age		
<20	4	.9
20-29	172	38.7
30-39	177	39.8
40-49	74	16.6
>50	17	3.8
No response	1	.2
Educational Level		
High school or below	78	17.5
Associate bachelor	197	44.3
Bachelor	162	36.4
Master	7	1.6
No response	1	.2
Years of Working		

< 6 months	7	1.6
6 months to 1 year	18	4.0
1-2 years	26	5.8
2-4 years	52	11.7
4-6 years	52	11.7
6-10 years	117	26.3
10-15 years	73	16.4
> 15 years	95	21.3
No response	5	1.1
Employer		
China Meheco Guangdong Pharmaceutical Co., Ltd.	168	37.8
Meheco Pharmaceutical (Jiangmen) Co., Ltd.	17	3.8
Meheco Pharmaceutical (Huizhou) Co., Ltd.	16	3.6
Meheco Foshan Pharmaceutical Co., Ltd..	42	9.4
Meheco Zhanjiang Wanbang Pharmaceutical Co., Ltd.	115	25.8
Meheco Pharmaceutical (Shenzhen) Co., Ltd.	22	4.9
Meheco Pharmaceutical (Dongguan) Co., Ltd.	15	3.4
Meheco Pharmaceutical (East Guangdong) Co., Ltd.	50	11.2
Years of working for the current employer		
<6 months	35	7.9
6 months to 1 year	80	18.0
1-2 years	78	17.5
2-4 years	99	22.2
4-6 years	51	11.5
6-10 years	61	13.7
10-15 years	17	3.8
> 15 years	10	2.2
No response	14	3.1
Job Category		
Marketing	117	26.3
Procurement	71	16.0
Finance	60	13.5
Logistics	49	11.0
Operation, Administration, QA	89	20.0
Other	57	12.8
No response	2	.4
Position Level		
Junior Management	116	26.1
Middle Management	58	13.0
Senior Management	16	3.6
Non-management	255	57.3

It can be seen from Table 4.2 that the sample includes 38% male and 62% female respondents. In terms of age, the proportion of respondents in different age groups was 0.9%,

38.7%, 39.8%, 16.6%, and 3.8%, respectively, the majority of whom are between 20 and 39 years old. In terms of educational level, the overall education of the respondents is quite high, with only 17.5% having high school degrees or below, 44.3% having associate bachelor's degrees, 36.4% having bachelor's degrees, and 1.6% having master's degrees. As for the working experience, 61.8% of the respondents have less than 10 years of working experience, representing the majority, and 37.7% have more than 10 years of working experience which is in line with their age range. In terms of the job level, senior managers, middle managers, junior managers, and non-managerial staff account for 3.6%, 13%, 26.1% and 57.3% respectively, reflecting a pyramid-shaped distribution pattern. The sample characteristics reproduce the demographics in the companies surveyed.

4.2 Step 1: Reliability and validity of the scales

A quantitative approach was followed in this thesis and a questionnaire survey using the scales described in Chapter 3 was administered. In order to ensure that the questionnaires are both reliable and valid, relevant tests have been conducted.

Reliability refers to the quality of being consistent, stable, and reliable and aims at demonstrating the extent to which the differences among the answers of survey respondents are caused by their real differences concerning the constructs and characteristics to be measured by the scale, rather than by random measurement errors. The common way to test the reliability of the scale is to evaluate its internal consistency, also known as internal reliability, which is to evaluate the degree to which each item in the scale measures the same phenomenon or concept (Pedhazur & Schmelkin, 1991). The most used index of internal consistency is the Cronbach's Alpha coefficient developed for the Likert scale (Cronbach, 1951), with a value range between 0 and 1. The closer to 1, the higher the reliability of internal consistency. Generally speaking, a reliability coefficient of 0.7 is an acceptable level, and a value higher than 0.8 indicates high reliability.

Validity indicates the quality of being valid. It refers to the degree to which the measurement tools or methods can accurately measure the objects intended to be measured and whether the measurement results can truly reflect the objectives and intentions of the measurement. The commonly used method to measure the validity of questionnaires is factor analysis, which includes exploratory factor analysis (EFA) and confirmatory factor analysis (CFA). Exploratory factor analysis (EFA) is more suitable when a new scale is being developed, otherwise confirmatory factor analysis is a preferred choice for validity testing. As the scales

used in this research for the core variables (organizational culture and Confucian Traditional Values at Workplace respectively) are established ones, confirmatory factor analysis (CFA) was adopted to test the validity of the questionnaires regarding these two constructs.

4.2.1 The reliability and validity of the Organizational Culture Scale

4.2.1.1 The reliability of the Organizational Culture Scale

SPSS 20 statistical software was used to analyze the reliability of the Organizational Culture Scale, the results of which are shown in Table 4.3, including the Cronbach's α coefficient of each indicator, as well as the mean, standard deviation, internal reliability, and item-total correlations of the four dimensions (traits) of organizational culture as described in Chapters 2 and 3.

Table 4.3 The Organizational Culture Scale

Trait	Indicator	Item	Item-total correlation	Mean	S.D
Involvement	Empowerment $\alpha = .79$	1	.611	4.02	.718
		2	.469	3.84	.783
		3	.621	3.77	.820
		4	.572	4.07	.635
		5	.623	4.02	.656
	Team Orientation $\alpha = .85$	6	.612	4.00	.750
		7	.683	4.15	.664
		8	.708	3.88	.820
		9	.714	4.32	.668
		10	.618	3.95	.774
	Capability Development $\alpha = .65$	11	.438	3.62	.879
		12	.650	3.94	.714
		13	.644	3.68	.833
		14	.565	3.80	.833
		15	-.047	3.09	1.009
Consistency	Core Values $\alpha = .75$	16	.527	3.69	.762
		17	.556	3.63	.782
		18	.620	3.90	.708
		19	.331	3.45	.945
		20	.619	3.82	.730
	Agreement $\alpha = .82$	21	.650	4.01	.731
		22	.643	3.85	.821
		23	.686	3.63	.848
		24	.515	3.48	.832
		25	.582	3.71	.725
Adaptability	Coordination & Integration $\alpha = .78$	26	.444	3.74	.662
		27	.670	3.85	.823
		28	.606	3.56	.942
		29	.465	3.59	1.000
		30	.645	3.96	.681
	Creating Change $\alpha = .70$	31	.408	3.53	.892
		32	.587	3.74	.752
		33	.656	3.86	.755
		34	.157	2.87	.886

Trait	Indicator	Item	Item-total correlation	Mean	S.D
Mission	Customer Focus $\alpha = .51$	35	.547	3.73	.790
		36	.413	3.61	.773
		37	.284	3.26	.823
		38	.413	3.42	.789
		39	.074	3.66	.811
	Organizational Learning $\alpha = .70$	40	.240	3.62	.818
		41	.497	4.08	.649
		42	.499	3.83	.811
		43	.388	3.33	1.017
		44	.517	4.16	.695
	Strategic Direction & Intent $\alpha = .80$	45	.451	3.75	.774
		46	.681	4.12	.704
		47	.444	3.58	.789
		48	.708	4.04	.671
		49	.689	4.10	.663
	Goals & Objectives $\alpha = .86$	50	.474	3.55	.980
		51	.660	3.88	.645
		52	.695	3.73	.766
		53	.694	4.01	.666
		54	.727	4.06	.603
	Vision $\alpha = .69$	55	.660	3.88	.704
		56	.678	4.03	.671
		57	.619	4.06	.695
		58	-.001	2.50	.924
		59	.584	3.85	.802
		60	.539	3.89	.741

As shown in Table 4.3, except for Capability Development, Customer Focus, and Vision, the Cronbach's α coefficient values of the remaining 9 indicators are all within the range from 0.70 to 0.86, indicating acceptable internal reliability (Nunnally, 1978). For Capability Development, the item of "problems often arise because we do not have the skills necessary to do the job" has an item-total correlation of -0.047, and therefore should be deleted. After such deletion, the Cronbach's α coefficient value of Capability Development increases to 0.82, signaling an acceptable internal reliability (see Table 4.4). For Customer Focus, the item-total correlation of the item "The interests of the customer often get ignored in our decisions" is as low as 0.074, and therefore should be deleted. After the deletion, the Cronbach's α coefficient value of Customer Focus increases slightly to 0.58 and remains below 0.7 even if more items are deleted. As a result, Customer Focus should be removed from the trait of Adaptability. For the indicator of Vision, the item-total correlation of "Short-term thinking often compromises our long-term vision" is -0.001, and therefore should be deleted. After the removal, the Cronbach's α coefficient value of Vision increases to 0.84, indicating an acceptable internal reliability (see Table 4.4).

Table 4.4 Cronbach's α coefficient and descriptive statistics of the revised Organizational Culture Scale

Dimension	Indicator	Item	Item-total correlation	Mean	SD
Involvement	Empowerment $\alpha = .78$	1	.598	4.02	.717
		2	.445	3.84	.779
		3	.605	3.75	.838
		4	.560	4.06	.638
		5	.615	4.00	.670
	Team Orientation $\alpha = .86$	6	.620	3.99	.762
		7	.698	4.15	.672
		8	.714	3.88	.820
		9	.722	4.31	.683
		10	.630	3.94	.784
	Capability Development $\alpha = .82$	11	.508	3.62	.879
		12	.723	3.94	.714
		13	.723	3.68	.833
		14	.637	3.80	.833
Consistency	Core Values $\alpha = .76$	16	.547	3.67	.771
		17	.568	3.62	.789
		18	.632	3.89	.728
		19	.328	3.45	.943
		20	.630	3.81	.742
	Agreement $\alpha = .82$	21	.639	4.00	.745
		22	.647	3.83	.831
		23	.689	3.63	.855
		24	.478	3.48	.835
		25	.587	3.69	.740
	Coordination & Integration $\alpha = .79$	26	.464	3.73	.678
		27	.682	3.84	.832
		28	.620	3.54	.953
		29	.460	3.59	.996
		30	.647	3.95	.693
Adaptability	Creating Change $\alpha = .71$	31	.426	3.52	.900
		32	.595	3.74	.764
		33	.674	3.85	.767
		34	.173	2.86	.892
		35	.562	3.72	.809
	Organizational Learning $\alpha = .70$	41	.494	4.08	.647
		42	.497	3.83	.806
		43	.378	3.31	1.028
		44	.502	4.16	.693
		45	.450	3.75	.781
Mission	Strategic Direction & Intent $\alpha = .80$	46	.679	4.11	.726
		47	.445	3.57	.789
		48	.719	4.03	.679
		49	.694	4.09	.680
		50	.487	3.53	.980
	Goals & Objectives $\alpha = .87$	51	.671	3.87	.649
		52	.705	3.72	.772
		53	.707	3.99	.675
		54	.733	4.05	.603
		55	.668	3.87	.709
	Vision $\alpha = .84$	56	.743	4.02	.676
		57	.668	4.05	.705

Dimension	Indicator	Item	Item-total correlation	Mean	SD
		59	.670	3.85	.804
		60	.639	3.88	.752

The revised Organizational Culture Scale has good internal consistency, indicating acceptable reliability (see Table 4.4).

4.2.1.2 The validity of the Organizational Culture Scale

The research used Amos 27 statistical software to conduct a confirmatory factor analysis of the Organizational Culture Scale for validity testing.

The revised Organizational Culture Scale (see Table 4.4) includes 4 dimensions, 11 indicators, and a total of 53 items. Setting the 53 items as observed variables, 11 indicators as first-order factors, and 4 dimensions as second-order factors, a second-order CFA model (see Figure 4.1) was built and tested.

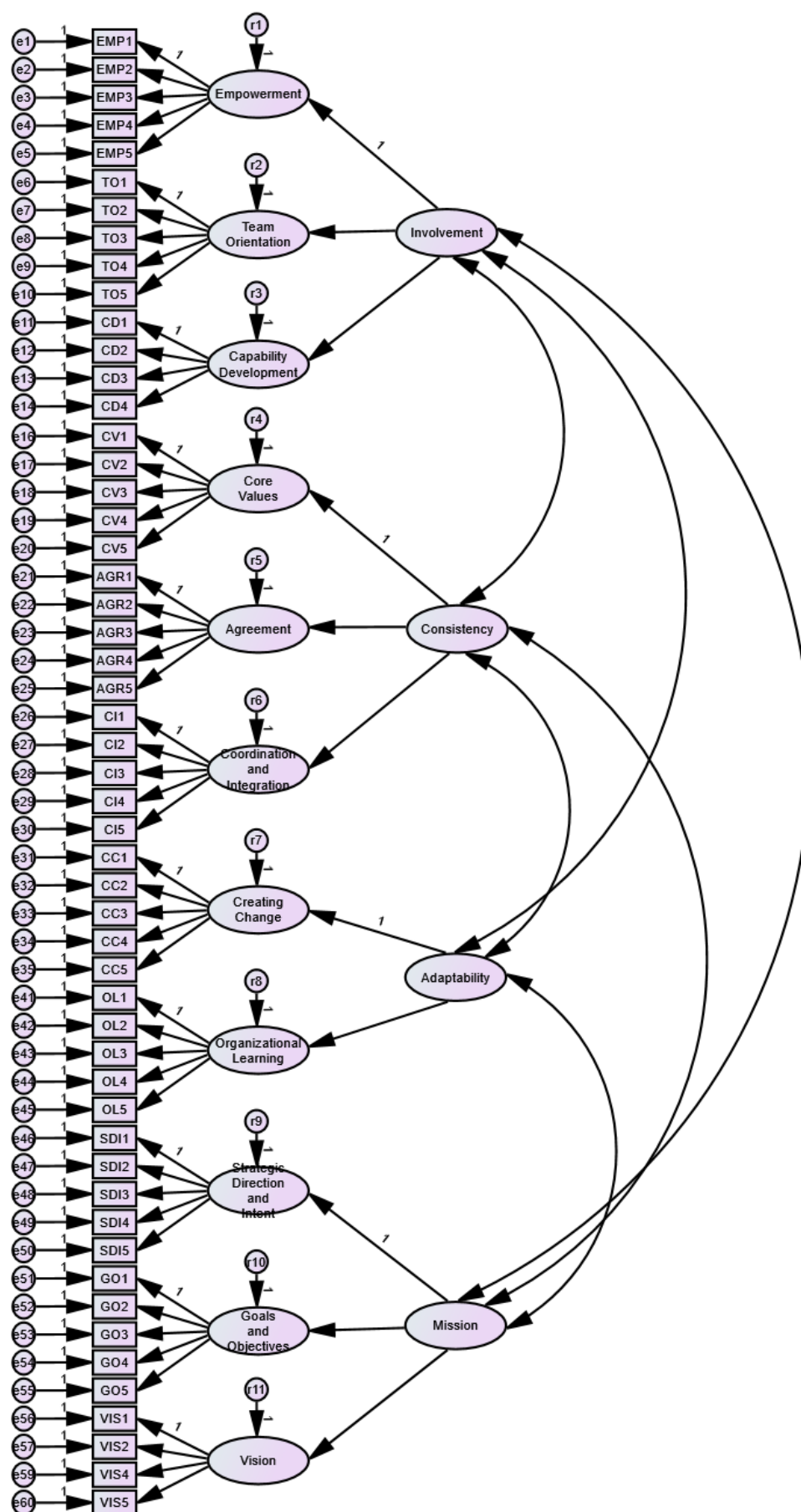


Figure 4.1 Second-order CFA model for Organizational Culture

After confirmatory factor analysis, the factor loading of the second-order CFA model for organizational culture is obtained (as shown in Table 4.5).

Table 4.5 actor loading of the second-order CFA model for organizational culture

Factor	Item/Factor	Factor loading
First-order factor	Item	
Empowerment	EMP1	.710***
	EMP2	.497***
	EMP3	.701***
	EMP4	.682***
	EMP5	.727***
Team Orientation	TO1	.685***
	TO2	.718***
	TO3	.782***
	TO4	.751***
	TO5	.741***
Capability Development	CD1	.582***
	CD2	.812***
	CD3	.825***
	CD4	.748***
Core Values	CV1	.647***
	CV2	.738***
	CV3	.792***
	CV4	.377***
	CV5	.775***
Agreement	AGR1	.731***
	AGR2	.758***
	AGR3	.728***
	AGR4	.527***
	AGR5	.706***
Coordination & Integration	CI1	.619***
	CI2	.774***
	CI3	.651***
	CI4	.492***
	CI5	.760***
Creating Change	CC1	.453***
	CC2	.737***
	CC3	.778***
	CC4	.245***
	CC5	.744***
Organizational Learning	OL1	.655***
	OL2	.763***
	OL3	.635***
	OL4	.644***
	OL5	.740***
Strategic Direction & Intent	SDI1	.772***
	SDI2	.543***
	SDI3	.838***
	SDI4	.797***
	SDI5	.513***
Goals & Objectives	GO1	.717***
	GO2	.774***
	GO3	.739***
	GO4	.782***

	GO5	.745***
Vision	VIS1	.836***
	VIS2	.778***
	VIS4	.728***
	VIS5	.684***
Second-order factor	First-order factor	
Involvement	Empowerment	.955***
	Team Orientation	.972***
	Capability Development	.942***
Consistency	Core Values	.919***
	Agreement	.978***
	Coordination & Integration	.968***
Adaptability	Creating Change	.941***
	Organizational Learning	.953***
Mission	Strategic Direction & Intent	.930***
	Goals & Objectives	.982***
	Vision	.999***

Note: *** indicates $p < 0.001$, ** indicates $p < 0.01$, * indicates $p < 0.05$

Table 4.5 shows that the factor loadings of all measurement items in relation to the first-order factors are significant at the level of $p < 0.001$, but the factor loadings of EMP2, CV4, CI4, CC1 and CC4 in relation to their corresponding first-order factors are less than 0.5, indicating weak relevance. After analyzing the measurement items with high cross loadings and correlated errors based on the theoretical analysis of organizational culture, together with modification indices, we deleted measurement items corresponding to more than one factor and screened items with similar measurement content. After that, we obtained the revised second-order confirmatory factor analysis model for organizational culture (see Figure 4.2) and its factor loading from the CFA (see Table 4.6).

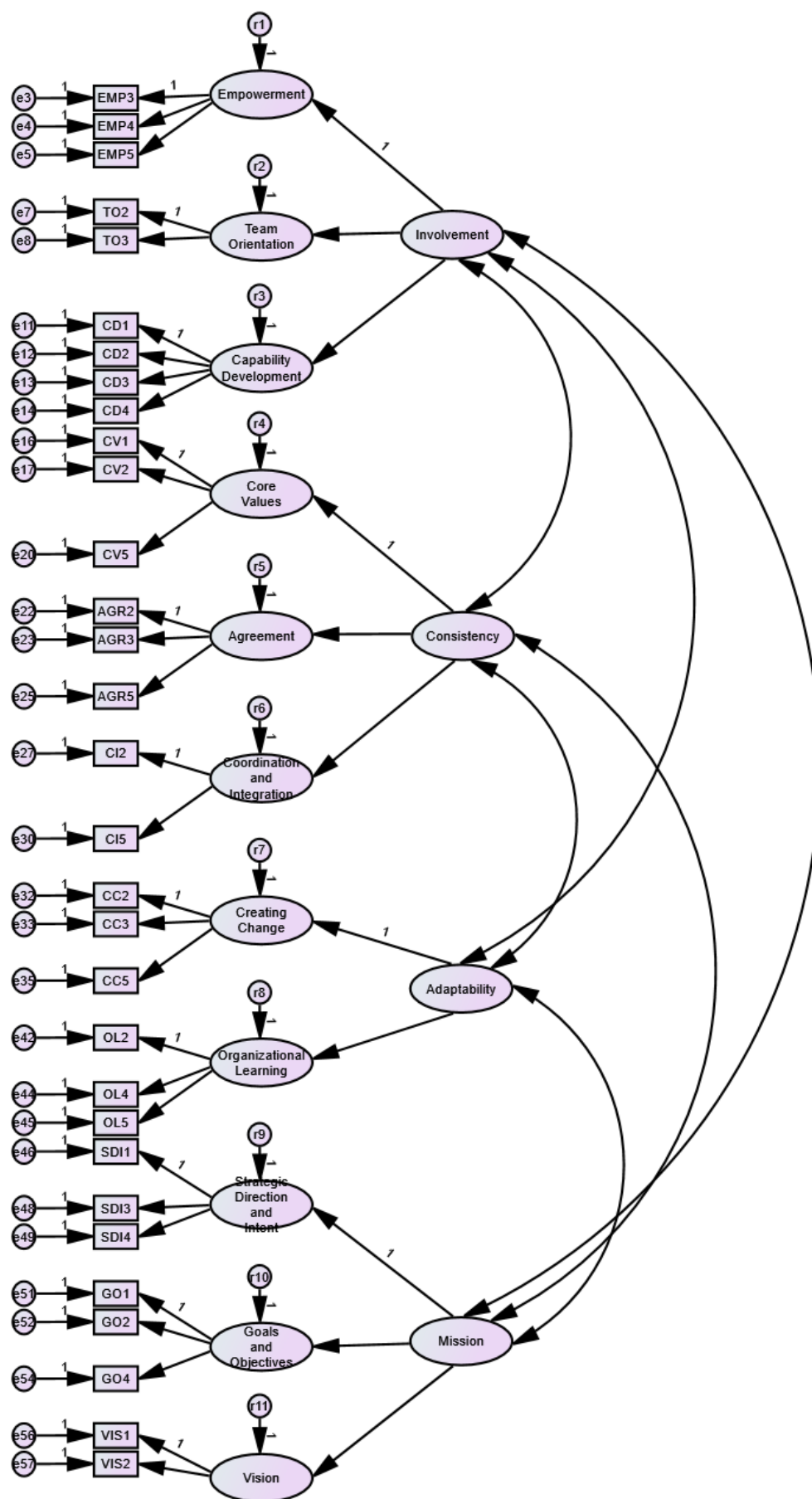


Figure 4.2 The revised second-order CFA model for organizational culture

Table 4.6 Factor loading of the revised second-order CFA model for organizational culture

Factor	Item/Factor	Factor loading
First-order factor	Item	
Empowerment	EMP3	.707***
	EMP4	.723***
	EMP5	.730***
Team Orientation	TO2	.704***
	TO3	.811***
Capability Development	CD1	.586***
	CD2	.809***
	CD3	.832***
	CD4	.741***
Core Values	CV1	.649***
	CV2	.743***
	CV5	.769***
Agreement	AGR2	.767***
	AGR3	.705***
	AGR5	.712***
Coordination & Integration	CI2	.772***
	CI5	.760***
Creating Change	CC2	.731***
	CC3	.770***
	CC5	.742***
Organizational Learning	OL2	.746***
	OL4	.629***
	OL5	.746***
Strategic Direction & Intent	SDI1	.774***
	SDI3	.852***
	SDI4	.790***
	GO1	.728***
Goals & Objectives	GO2	.783***
	GO4	.753***
	VIS1	.848***
Vision	VIS2	.799***
Second-order factor	First-order factor	
Involvement	Empowerment	.929***
	Team Orientation	.947***
	Capability Development	.955***
Consistency	Core Values	.926***
	Agreement	.987***
	Coordination & Integration	.966***
Adaptability	Creating Change	.953***
	Organizational Learning	.978***
Mission	Strategic Direction & Intent	.906***
	Goals & Objectives	.964***
	Vision	.981***

Note: *** indicates $p < 0.001$, ** indicates $p < 0.01$, * indicates $p < 0.05$

It can be seen from Table 4.6 that the factor loadings of all measurement items in relation to first-order factors are above 0.5 and are significant at the level of $p < 0.001$. We used such fitting indexes as Chi-square/df, RMR, GFI, AGFI, NFI, TLI, CFI and RMSEA to estimate the fitting degree of this model. Table 4.7 shows the criteria and the results of the fitting indexes in the model.

Table 4.7 Fitting indexes of the revised second-order CFA model of organizational culture

Fitting Index	Chi-square/df	RMR	GFI	AGFI	NFI	TLI	CFI	RMSEA
Criteria	<3	<0.05	>0.9	>0.9	>0.9	>0.9	>0.9	<0.08
Results	1.765	0.018	0.909	0.890	0.918	0.958	0.962	0.042

As may be seen from Table 4.7, the overall fitting indexes indicates a high level of fitness between the sampled data and the model. The values of Chi-square/df, RMR, GFI, NFI, TLI, CFI and RMSEA all meet the criteria, and the value of AGFI is very close to 0.9. Such results confirm that the revised Organizational Culture Scale has good construct validity.

Based the factor loading, we can get the values of CR (Construct Reliability) and AVE (Average Variance Extracted) of the first-order and the second-order factors: the CR values of the first-order factors of Empowerment, Team Orientation, Capability Development, Core Values, Agreement, Coordination & Integration, Creating Change, Organizational Learning, Strategic Direction & Intent, Goals & Objectives and of the second-order factors of Involvement, Consistency, Adaptability, and Mission are 0.764, 0.731, 0.833, 0.765, 0.772, 0.740, 0.792, 0.751, 0.847, 0.799 and 0.961, 0.972, 0.965, 0.966 respectively. Their AVE values are 0.518, 0.577, 0.560, 0.522, 0.531, 0.587, 0.559, 0.503, 0.650, 0.570 and 0.891, 0.922, 0.932, 0.904, respectively. As all CR values are greater than 0.6, and AVE values greater than 0.5, we can conclude that the convergent validity of the revised Organizational Culture Scale is acceptable.

4.2.2 The reliability and validity of Confucian Traditional Values at Workplace Scale

4.2.2.1 The reliability of Confucian Traditional Values at Workplace Scale

To analyze the reliability of the scale of Confucian Traditional Values at Workplace (CTVW) SPSS 20 was used as per results shown in Table 4.8, including the Cronbach's α coefficient value of each indicator, as well as the mean, standard deviation, internal reliability, and item-total correlations of the items related to this construct.

Table 4.8 Cronbach's α coefficient and descriptive statistics of the CTVW Scale

Indicator	Item	Item-total correlation	Mean	S.D
Respect and compliance to authorities (CA) $\alpha = .70$	1	.523	3.84	.878
	2	.540	3.27	.963
	3	.468	3.23	.983
	4	.407	4.04	.757
Tolerance and altruism (TA) $\alpha = .71$	5	.419	3.39	1.018
	6	.532	3.92	.739
	7	.504	3.39	.920
	8	.503	3.99	.679
Acceptance of authorities	9	.409	4.04	.717
	10	.555	2.81	1.010

Indicator	Item	Item-total correlation	Mean	S.D
(AA) $\alpha = .72$	11	.595	2.62	.962
	12	.422	2.33	.886
	13	.473	2.25	.884
Face (FC) $\alpha = .59$	14	.381	3.63	.991
	15	.431	3.11	1.022
	16	.392	3.66	.827

As shown in Table 4.8, except for the indicator of “face” (FC), the Cronbach’s α coefficient values of the other three indicators all reach 0.7 or above, indicating acceptable internal reliability. For the indicator of “face”, we try to delete some of its items, only to find that the Cronbach’s α coefficient value still remains lower than 0.7. Therefore, the indicator of “face” should be removed from the Confucian Traditional Values at Workplace Scale. The adjusted CTVW Scale includes three indicators: respect and compliance to authorities (CA), tolerance and altruism (TA), and acceptance of authorities (AA).

4.2.2.2 The validity of Confucian Traditional Values at Workplace Scale

Amos 27 statistical software was used to conduct a confirmatory factor analysis of the Confucian Traditional Values at Workplace Scale for validity testing.

The CTVW Scale includes 3 dimensions, namely respect and compliance to authorities (CA), tolerance and altruism (TA), and acceptance of authorities (AA), as well as 13 items. Setting the 13 items as observed variables, the three dimensions as the first-order factors, and Confucian traditional values at workplace (CTVW) as the second-order factor, a second-order CFA model (see Figure 4.3) was built and tested.

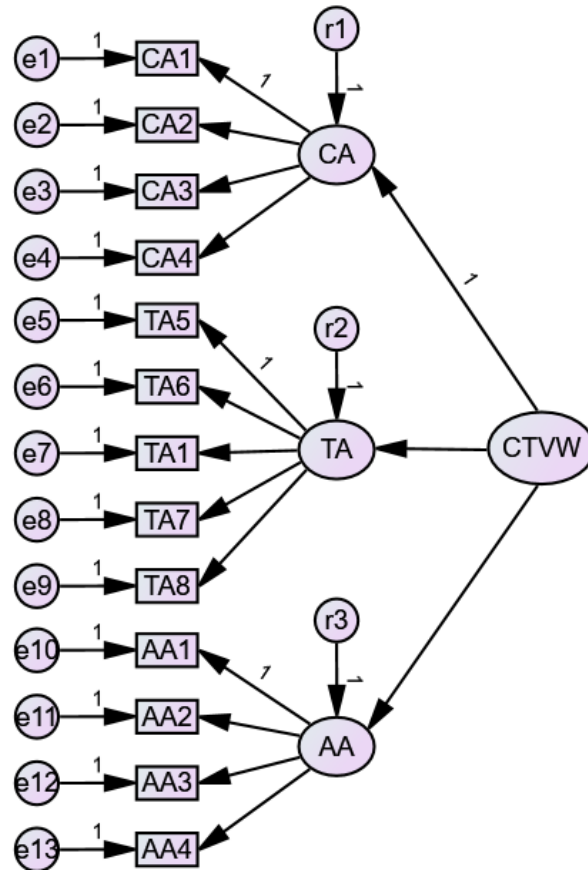


Figure 4.3 Second-order CFA model for CTVW

After confirmatory factor analysis, the factor loading of the second-order CFA model for CTVW was obtained (as shown in Table 4.9).

Table 4.9 Factor loading of the second-order CFA model for CTVW

Factor First-order factor	Item/Factor Item	Factor loading
Respect and compliance to authorities (CA)	CA1	.729***
	CA2	.782***
	CA3	.656***
	CA4	.664***
Tolerance and altruism (TA)	TA5	.704***
	TA6	.778***
	TA7	.798***
	TA8	.730***
Acceptance of authorities (AA)	AA1	.658***
	AA2	.799***
	AA3	.809***
	AA4	.392***
Second-order factor	First-order factor	
Confucian traditional values at workplace (CTVW)	CA	.440***
	TA	.840***
	AA	.836***

Note: *** indicates $p < 0.001$, ** indicates $p < 0.01$, * indicates $p < 0.05$

Table 4.9 shows that the factor loadings of all measurement items in relation to first-order

factors are significant at the level of $p < 0.001$, except that the factor loadings of AA3 and AA4 in relation to the first-order factor “acceptance of authorities” (AA) are less than 0.5, indicating weak corresponding relationship. After deleting AA3 and AA4, we obtained the revised second-order confirmatory factor analysis model for Confucian traditional values at workplace (see Figure 4.4), and its factor leading from the CFA (see Table 4.10).

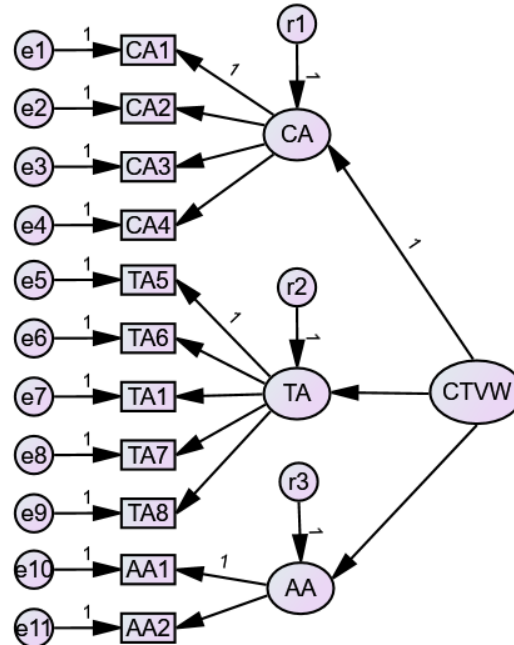


Figure 4.4 The revised second-order CFA model for CTVW

Table 4.10 Factor loading of the revised second-order CFA model for CTVW

Factor	Item/Factor	Factor loading
First-order factor		
Respect and compliance to authorities (CA)	Item	
	CA1	.731***
	CA2	.778***
	CA3	.654***
Tolerance and altruism (TA)	CA4	.666***
	TA5	.696***
	TA6	.775***
	TA1	.798***
	TA7	.734***
Acceptance of authorities (AA)	TA8	.666***
	AA1	.876***
	AA2	.746****
Second-order factor		
Confucian traditional values at workplace (CTVW)	First-order factor	
	CA	.802***
	TA	.875***
	AA	.556***

Note: *** indicates $p < 0.001$, ** indicates $p < 0.01$, * indicates $p < 0.05$

It can be seen from Table 4.10 that the factor loadings of all measurement items in relation to first-order factors are above 0.5 and are significant at the level of $p < 0.001$. We use such fitting indexes as Chi-square/df, RMR, GFI, AGFI, NFI, TLI, CFI and RMSEA to estimate the fitting

degree of this model. Table 4.11 shows the criteria and the results of the fitting indexes in the model.

Table 4.11 Fitting indexes of the revised second-order CFA model of CTVW

Fitting Index	Chi-square/df	RMR	GFI	AGFI	NFI	TLI	CFI	RMSEA
Criteria	<3	<0.05	>0.9	>0.9	>0.9	>0.9	>0.9	<0.08
Results	3.005	0.037	0.95	0.919	0.9	0.907	0.93	0.067

As may be seen from Table 4.11, except for Chi-square/df, all fitting indexes of the CFA model are up to the criteria, indicating a good level of fitness. The revised CTVW Scale has good construct validity.

According to the values of the factor loading, we can calculate the values of CR and AVE of the first-order factors and the second-order factor. The CR values of the first-order factors of respect and compliance to authorities (CA), tolerance and altruism (TA), and acceptance of authorities (AA) and of the second-order factor Confucian Traditional Values at Workplace are 0.801, 0.854, 0.796 and 0.795 respectively. Their AVE values are 0.503, 0.541, 0.662 and 0.573 respectively. As all CR values are greater than 0.6, and AVE values greater than 0.5, we can conclude that the convergent validity of the revised CTVW Scale is acceptable.

4.3 Step 2: Descriptive statistics and correlation analysis of Confucian traditional values at workplace, organizational culture, and employee satisfaction

To test the research hypotheses, we first explore the relationships among Confucian traditional values at workplace, organizational culture and employee satisfaction through descriptive statistical analysis and correlation analysis of the variables. Confucian traditional values at workplace, organizational culture and employee satisfaction have been quantitatively translated, and therefore Pearson's simple correlation coefficient r should be used to measure their correlation. This coefficient varies between -1 and +1 and if the value of r is greater than 0, it indicates a positive linear correlation between the variables; if the value of r is smaller than 0, it means a negative linear correlation between the variables. The closer the r value is to -1 or +1, the stronger the linear correlation; the closer the r value is to 0, the weaker the linear correlation. An absolute value of r less than 0.3 indicates a weak linear correlation, and an absolute value greater than 0.8 signifies a strong linear correlation. The research used SPSS 20 statistical software to analyze the correlations between Confucian traditional values at workplace, organizational culture and employee satisfaction, the results of which are shown in Table 4.12.

Table 4.12 Correlations between Confucian traditional values at workplace, organizational culture and employee satisfaction

Variable	Mean	SD	1	2	3	4	5	6	7	8	9	10
1. Age	2.860	.847	1									
2. Educational level	2.240	.749	-.073	1								
3. Years of working	10.627	7.360	.792**	-.125*	1							
4. Years of working for the current employer	4.151	3.892	.377**	-.111*	.447**	1						
5. Confucian Traditional Values at Workplace	3.519	.411	.184**	-.045	.210**	.153**	1					
6. Involvement	3.964	.540	.185**	-.103*	.196**	.036	.480**	1				
7. Consistency	3.811	.549	.200**	-.103*	.200**	.025	.493**	.856**	1			
8. Adaptability	3.769	.581	.074	-.165**	.096	.014	.460**	.752**	.796**	1		
9. Mission	3.950	.520	.156**	-.109*	.154**	.045	.457**	.783**	.855**	.800**	1	
10. Employee Satisfaction	3.550	1.057	.182**	-.152**	.138**	.003	.338**	.601**	.597**	.554**	.596**	1

Note: n=390. *p<0.05. **p<0.01. ***p<0.001.

The table shows that Confucian traditional values at workplace and the four dimensions of organizational culture, i.e., involvement, consistency, adaptability, and mission, all have significantly positive linear correlations with employee satisfaction. We first calculated the direct correlation between Confucian traditional values at workplace and employee satisfaction (without considering the role of organizational culture) and found that there is a significant and positive correlation ($r=0.338$, $p<0.01$). Then we considered the correlations between each of the four traits of organizational culture and employee satisfaction and found even more significant and positive correlations: involvement is significantly and positively correlated with employee satisfaction ($r=0.601$, $p<0.01$); consistency is significantly and positively correlated with employee satisfaction ($r=0.597$, $p<0.01$); adaptability is significantly and positively correlated with employee satisfaction ($r=0.554$, $p<0.01$); mission is significantly and positively correlated with employee satisfaction ($r=0.596$, $p<0.01$).

The four dimensions of organizational culture, i.e., involvement, consistency, adaptability, and mission, all have significantly positive linear correlations with Confucian traditional values at workplace: involvement is significantly and positively correlated with Confucian traditional values at workplace ($r=0.480$, $p<0.01$); consistency is significantly and positively correlated with Confucian traditional values at workplace ($r=0.493$, $p<0.01$); adaptability is significantly and positively correlated with Confucian traditional values at workplace ($r=0.460$, $p<0.01$); mission is significantly and positively correlated with Confucian traditional values at workplace ($r=0.457$, $p<0.01$).

We then checked the relationship between the demographic variables in the data and employee satisfaction. Except for years of working for the current employer, all other three demographic variables, namely age, educational level and total years of work experience, have significant but weaker linear correlations with employee satisfaction: age is significantly and positively correlated with employee satisfaction ($r=0.182$, $p<0.01$); educational level is significantly and negatively correlated with employee satisfaction ($r=-0.152$, $p<0.01$); years of working is significantly and positively correlated with employee satisfaction ($r=0.138$, $p<0.01$). Therefore, the variables in the research are well correlated, and such correlations are basically consistent with the theoretical model or research hypotheses, which proved to be well-grounded.

4.3.1 Difference analysis of Confucian traditional values at workplace, organizational culture, and employee satisfaction

To better understand the three core variables in the theoretical model, we conducted difference analysis of Confucian traditional values at workplace, organizational culture, and employee

satisfaction one by one. Confucian traditional values at workplace and employee satisfaction are individual-level constructs, so we analyzed their individual differences in the case of different demographic characteristics. Organizational culture, on the other hand, is a unit-level variable, so we analyzed the differences in the scores of the four dimensions of organizational culture (involvement, consistency, adaptability, and mission) among Meheco Guangdong and its seven subsidiaries.

4.3.1.1 Individual differences in Confucian traditional values at workplace and employee satisfaction

We conducted individual difference analysis of Confucian traditional values at workplace and employee satisfaction in the case of different demographic characteristics, which include gender, age, educational level, job category and position level. The test method to be used depends on the number of groups a certain demographic variable has. If a demographic variable has two groups, we would use two independent sample t-tests to see whether there are significant differences in the overall mean values of Confucian traditional values at workplace and employee satisfaction between two groups of that demographic variable ($p < 0.05$). If the demographic variable has more than two groups, we would first conduct the homogeneity of variance test. If the homogeneity of variance is met ($p > 0.05$), then a one-way analysis of variance (ANOVA) is used to test whether there are significant differences in the overall mean values of Confucian traditional values at workplace and employee satisfaction among different groups of that demographic variable ($p < 0.05$); if the homogeneity of variance is not matched ($p < 0.05$), we would use multi-independent sample median test to see whether there are significant differences in the overall median values of Confucian traditional values at workplace and employee satisfaction among different groups of that demographic variable ($p < 0.05$).

4.3.1.2 Differences in Confucian traditional values at workplace and employee satisfaction between different genders

As gender has two groups, we use two independent sample t-tests to see whether there are significant differences in the overall mean values of Confucian traditional values at workplace and employee satisfaction between different genders ($p < 0.05$). Table 4.13 shows the results of the difference analysis of Confucian traditional values at workplace and employee satisfaction between different genders.

Table 4.13 Differences in Confucian traditional values at workplace and employee satisfaction between different genders

Variable	Gender	n	Mean	Levene F of homogeneity of variance test	T value of two independent sample t-test
Confucian Traditional Values at Workplace	Male	169	3.573	4.713*	2.283*
	Female	276	3.478		
Employee Satisfaction	Male	158	3.680	1.094	1.670
	Female	245	3.500		

Note: * $p < 0.05$. ** $p < 0.01$. *** $p < 0.001$.

As shown in Table 4.13, the p-value of the homogeneity of variance test of Confucian traditional values at workplace in the case of different genders is less than 0.05, which does not meet homogeneity of variance, so we should look at the result of the t-test assuming unequal variance. As the p-value of unequal variance t-test is less than 0.05, it shows that there is a significant difference in the overall mean value of Confucian traditional values at workplace between different genders. From Table 4.13 we can see that the homogeneity of variance test of employee satisfaction in the case of different genders has a p-value greater than 0.05, which matches homogeneity of variance. Therefore, we should look at the result of t-test assuming equal variance. As the p-value of equal variance t-test is greater than 0.05, it indicates that there is no significant difference in the overall mean values of employee satisfaction between genders.

4.3.1.3 Differences in Confucian traditional values at workplace and employee satisfaction among different age groups

As age has five groups, homogeneity of variance test is conducted in the first place. If homogeneity of variance is met ($p > 0.05$), we will use one-way analysis of variance (ANOVA) to test whether there are significant differences in the overall mean values of Confucian traditional values at workplace and employee satisfaction among different age groups; if homogeneity of variance is not met ($p < 0.05$), we will use multi-independent sample median test to see whether there are significant differences in the overall median of Confucian traditional values at workplace and employee satisfaction among different age groups ($p < 0.05$). Table 4.14 shows the results of the difference analysis of Confucian traditional values at workplace and employee satisfaction among different age groups.

Table 4.14 Differences in Confucian traditional values at workplace and employee satisfaction among different age groups

Variable	Age	n	Mean	Levene F of homogeneity of variance test	F of ANOVA
Confucian Traditional Values at Workplace	<20	4	3.000	1.248	4.310**
	20-29	172	3.447		
	30-39	177	3.550		
	40-49	74	3.561		
	>50	17	3.717		
Employee Satisfaction	<20	4	3.250	1.206	2.991*
	20-29	153	3.410		
	30-39	159	3.570		
	40-49	72	3.880		
	>50	14	3.930		

Note: * $p < 0.05$. ** $p < 0.01$. *** $p < 0.001$.

As shown in Table 4.14, the p-values of the homogeneity of variance test of Confucian traditional values at workplace and employee satisfaction of different age groups are both greater than 0.05, which matches the homogeneity of variance. Therefore, we adopt ANOVA to test whether there are significant differences ($p < 0.05$) in the overall mean values of Confucian traditional values at workplace and employee satisfaction among different age groups. From Table 4.14, we can see that the p-values of ANOVA test of Confucian traditional values at workplace and employee satisfaction are both smaller than 0.05, which shows that there are significant differences in the overall mean values of Confucian traditional values at workplace and employee satisfaction among different age groups.

4.3.1.4 Differences in Confucian traditional values at workplace and employee satisfaction among different groups of educational level

As educational level has four groups, homogeneity of variance test is conducted in the first place. If homogeneity of variance is met ($p > 0.05$), we will use one-way analysis of variance (ANOVA); if homogeneity of variance is not met, ($p < 0.05$), we will use multi-independent sample median test. Table 4.15 shows the results of the difference analysis of Confucian traditional values at workplace and employee satisfaction among different groups of educational level.

Table 4.15 Differences in Confucian traditional values at workplace and employee satisfaction among different educational level groups

Variable	Educational level	n	Mean	Levene F of homogeneity of variance test	F of ANOVA
Confucian Traditional Values at Workplace	High school or below	78	3.640	1.418	4.489**
	Associate bachelor	197	3.445		
	Bachelor	162	3.534		
	Master	7	3.617		
	High school or below	67	3.940		
Employee Satisfaction	Associate bachelor	178	3.520	1.236	3.665*
	Bachelor	150	3.460		
	Master	7	3.290		

Note: * $p < 0.05$. ** $p < 0.01$. *** $p < 0.001$.

As shown in Table 4.15, the p-values of the homogeneity of variance test of Confucian traditional values at workplace and employee satisfaction of different groups of educational level are both greater than 0.05, which matches the homogeneity of variance. Therefore, we adopt ANOVA to test whether there are significant differences ($p < 0.05$) in the overall mean values of Confucian traditional values at workplace and employee satisfaction among different groups of educational level. From Table 4.15, we can see that the p-values of ANOVA test of Confucian traditional values at workplace and employee satisfaction are both smaller than 0.05, which shows that there are significant differences in the overall mean values of Confucian traditional values at workplace and employee satisfaction among different groups of educational level.

4.3.1.5 Differences in Confucian traditional values at workplace and employee satisfaction among different groups of job category

As job category has six groups, homogeneity of variance test is conducted in the first place. If homogeneity of variance is met ($p > 0.05$), we will use one-way analysis of variance (ANOVA); if homogeneity of variance is not met, ($p < 0.05$), we will use multi-independent sample median test. Table 4.16 shows the results of the difference analysis of Confucian traditional values at workplace and employee satisfaction among different groups of job category.

Table 4.16 Differences in Confucian traditional values at workplace and employee satisfaction among different job category groups

Variable	Job category	n	Mean	Levene F of homogeneity of variance test	F of ANOVA
Confucian Traditional Values at Workplace	Marketing	117	3.605	1.770	2.448*
	Procurement	71	3.409		
	Finance	60	3.539		
	Logistics	49	3.542		
	Operation, Administration, QA	89	3.464		
	Other	57	3.485		
	Marketing	112	3.580		
Employee Satisfaction	Procurement	68	3.320	1.823	1.973
	Finance	49	3.730		
	Logistics	43	3.910		
	Operation, Administration, QA	79	3.530		
	Other	50	3.480		

Note. * $p < 0.05$. ** $p < 0.01$. *** $p < 0.001$.

As shown in Table 4.16, the p-values of the homogeneity of variance test of Confucian traditional values at workplace and employee satisfaction of different job category groups are both greater than 0.05, which matches the homogeneity of variance. Therefore, we adopt ANOVA to test whether there are significant differences ($p < 0.05$) in the overall mean values of Confucian traditional values at workplace and employee satisfaction among different groups of job category. From Table 4.16, we can see that the p-value of the ANOVA test of Confucian traditional values at workplace is less than 0.05, which shows that there is a significant difference in the overall mean value of Confucian traditional values at workplace among different job category groups while the p-value of the ANOVA test of employee satisfaction is greater than 0.05, which shows that there is no significant difference in the overall mean value of employee satisfaction among different job category groups.

4.3.1.6 Differences in Confucian traditional values at workplace and employee satisfaction among different groups of position level

As position level has four groups, homogeneity of variance test is conducted in the first place. If homogeneity of variance is met ($p > 0.05$), we will use one-way analysis of variance (ANOVA); if homogeneity of variance is not met ($p < 0.05$), we will use multi-independent sample median test. Table 4.17 shows the results of the difference analysis of Confucian traditional values at workplace and employee satisfaction among different groups of position level.

Table 4.17 The differences in Confucian traditional values at workplace and employee satisfaction among different groups of position level

Variable	Position level	n	Mean	Levene F of Homogeneity of Variance test	F of ANOVA
Confucian Traditional Values at Workplace	Junior Management	116	3.422	1.308	2.701*
	Middle Management	58	3.556		
	Senior Management	16	3.594		
	Non-management	255	3.542		
	Junior Management	104	3.530		
Employee Satisfaction	Middle Management	58	3.520	.965	1.213
	Senior Management	15	4.070		
	Non-management	226	3.570		

Note: * $p < 0.05$. ** $p < 0.01$. *** $p < 0.001$.

As shown in Table 4.17, the p-values of the homogeneity of variance test of Confucian traditional values at workplace and employee satisfaction of different groups of position level are both greater than 0.05, which matches the homogeneity of variance. Therefore, we adopt ANOVA to test whether there are significant differences ($p < 0.05$) in the overall mean values of Confucian traditional values at workplace and employee satisfaction among different groups of position level. From Table 4.17, we can see that the p-value of ANOVA test of Confucian traditional values at workplace is less than 0.05, which shows that there is a significant difference in the overall mean value of Confucian traditional values at workplace among different groups of position level; the p-value of ANOVA test of employee satisfaction is greater than 0.05, which shows that there is no significant difference in the overall mean value of employee satisfaction among different groups of position level.

4.3.1.7 Summary of difference analysis of Confucian traditional values at workplace and employee satisfaction

Based on the results of the difference analysis of Confucian traditional values at workplace and employee satisfaction with different demographic characteristics, it is found that the overall mean value of Confucian traditional values at workplace is significantly different among different groups of gender, age, educational level, job category and position level and that the overall mean value of employee satisfaction is significantly different among different groups of age and educational level but not in the case among different groups of gender, job category

and position level. The analysis results are summarized in Table 4.18.

Table 4.18 Summary of differences in Confucian traditional values at workplace and employee satisfaction with different demographic characteristics

Variable	Gender	Age	Educational level	Job Category	Position Level
Confucian Traditional Values at Workplace	significant difference *	significant difference **	significant difference **	significant difference *	significant difference *
Employee Satisfaction	insignificant difference	significant difference *	significant difference *	insignificant difference	insignificant difference

Note: * $p < 0.05$. ** $p < 0.01$. *** $p < 0.001$.

4.3.2 Differences in organizational culture among the companies

Since we have collected data from both the Meheco headquarters and seven subsidiaries in different locations in Guangdong province we were interested in analyzing whether there were differences among them in the scores of the four dimensions of organizational culture (involvement, consistency, adaptability, and mission). For such purpose we first conducted the homogeneity of variance test. If the homogeneity of variance is met ($p > 0.05$), then a one-way analysis of variance (ANOVA) is used to test whether there are significant differences in the overall mean of the scores of the four dimensions among different companies ($p < 0.05$); if the homogeneity of variance is not matched ($p < 0.05$), we would use the multi-independent sample median test to see whether there are significant differences in the overall median of the different scores ($p < 0.05$). Table 4.19 shows the results of difference analysis of the scores of the four dimensions of organizational culture among eight companies.

Table 4.19 Differences in scores of the four dimensions of organizational culture among 8 companies

Dimension	Company	n	Median	Levene F of Homogeneity of Variance test	Chi-square of median test
Involvement (Median=3.917)	1	168	3.750	3.126**	25.531**
	2	17	4.083		
	3	16	4.042		
	4	42	3.917		
	5	115	4.083		
	6	22	4.042		
	7	15	4.500		
	8	50	3.917		
Consistency (Median=3.750)	1	168	3.583	2.896**	38.906***
	2	17	4.000		
	3	16	3.833		
	4	42	3.917		
	5	115	3.917		
	6	22	3.917		
	7	15	4.167		

Dimension	Company	n	Median	Levene F of Homogeneity of Variance test	Chi-square of median test
Adaptability (Median=3.800)	8	50	3.833	2.409*	27.403***
	1	168	3.600		
	2	17	4.000		
	3	16	3.700		
	4	42	3.800		
	5	115	4.000		
	6	22	3.800		
	7	15	4.000		
Mission (Median=3.929)	8	50	3.700	3.780**	32.173***
	1	168	3.786		
	2	17	4.214		
	3	16	3.929		
	4	42	3.929		
	5	115	4.000		
	6	22	3.929		
	7	15	4.286		
	8	50	3.929		

Note: * $p < 0.05$. ** $p < 0.01$. *** $p < 0.001$.

As shown in Table 4.19, the p-values of the homogeneity of variance test of the scores of the four dimensions of organizational culture in eight companies are all less than 0.05, which does not meet homogeneity of variance. Therefore, we use multi-independent sample median test to see whether there are significant differences ($p < 0.05$) in the overall median of the scores of the four dimensions of organizational culture among eight companies. Table 4.19 shows that the p-values of the median test of scores of the four dimensions of organizational culture among eight companies are all less than 0.05, which proves that there are significant differences in the scores of the four dimensions of organizational culture among eight companies. In addition, the difference in the score of consistency among eight companies is the largest (Chi-square=38.906, $p < 0.001$), while the difference in involvement is the smallest (Chi-square=25.531, $p < 0.01$).

4.4 Step 3: Hypothesis testing

As per Chapter 1, this thesis advances the argument that Confucian traditional values at work have an important impact on employee satisfaction and that organizational culture (considering Denison's four dimensions) plays a moderating role in the relationship between these two constructs. Five hypotheses have been proposed in Chapters 2 and 3 and will be tested in the following sections.

4.4.1 The Influence of Confucian traditional values at workplace on employee satisfaction

To test the influence of Confucian traditional values at workplace on employee satisfaction (H_1),

we established a regression model of the relationship between Confucian traditional values at workplace and employee satisfaction and used SPSS to conduct regression analysis on the sample data with demographic characteristics as the control variable. The regression analysis results are shown in Table 4.20.

Table 4.20 Regression analysis results of the relationship between Confucian traditional values at workplace and employee satisfaction

	Employee satisfaction	
	M ₁	M ₂
Intercept	3.379***	0.578
Age	0.264**	0.247*
Educational level	-0.209**	-0.201**
Years of working	-0.001	-0.008
Years of working for the current employer	-0.024	-0.030*
Confucian traditional values at workplace		0.833***
ΔR^2		0.099***
R^2	0.060	0.159
F	6.110***	14.539***

Note: n=390. *p<0.05. **p<0.01. ***p<0.001.

As reflected in Table 4.20, the analysis of regression model M₂ shows that the influence coefficient of Confucian traditional values at workplace on employee satisfaction is $\beta=0.833$ (p<0.001), indicating a significantly positive effect. The R^2 of the regression model M₂ equals 0.159, which means that 15.9% of the variance in employee satisfaction can be explained by Confucian traditional values at workplace. In addition, the R^2 of M₂ is significantly higher than that of M₁. Therefore, the hypothesis that Confucian traditional values at workplace has a positive effect on employee satisfaction (H₁) is confirmed.

4.4.2 The moderating effect of organizational culture on the relationship between Confucian traditional values at workplace and employee satisfaction

In order to test the hypotheses (H₂, H₃, H₄, H₅) on the moderating effect of organizational culture on the relationship between Confucian traditional values at workplace and employee satisfaction, we used SPSS to perform hierarchical regression analysis and tested the moderating effects of the four dimensions of organizational culture, namely involvement, consistency, adaptability and mission on the relationship between Confucian traditional values at workplace and employee satisfaction one by one. The research takes a “standardized” approach to process two variables in the interaction term to reduce the possibility of multicollinearity derived from adding interaction term to the regression equation.

4.4.2.1 The moderating effect of “involvement”

The hierarchical regression analysis results of the moderating effect of involvement on the relationship between Confucian traditional values at workplace and employee satisfaction are shown in Table 4.21.

Table 4.21 The moderating effect of involvement on the relationship between Confucian traditional values at workplace and employee satisfaction

Variables	Employee satisfaction		
	M ₃₁	M ₄₁	M ₅₁
Step1: control variables			
Age	0.264**	0.199*	0.200*
Educational level	-0.209**	-0.141*	-0.142*
Years of working	-0.001	-0.014	-0.014
Years of working for the current employer	-0.024	-0.015	-0.016
Step2: main effect			
Confucian traditional values at workplace		0.179*	0.214*
Involvement		1.074***	1.061***
Step3: interaction effect			
Involvement* Confucian traditional values at workplace			-0.056
ΔR^2		0.324***	0.003
R^2	0.060	0.384	0.387
F	6.110***	39.743***	34.440***

Note. n=390. *p<0.05. **p<0.01. ***p<0.001.

As can be seen from Table 4.21, when Confucian traditional values at workplace and involvement are added to M₃₁, represented as M₄₁, the value of R^2 has a significant increase ($\Delta R^2=0.324$, $p<0.001$), with the regression coefficients of 0.179 ($p<0.05$) and 1.074 ($p<0.001$) respectively, passing the t-test. This proves that Confucian traditional values at workplace and involvement have significantly positive effects on employee satisfaction.

When the interaction term of involvement and Confucian traditional values at workplace is added to M₄₁, represented as M₅₁, the regression coefficient becomes -0.056, which is negative but not significant ($p>0.05$). As neither the t-test is passed, nor R^2 is significantly improved ($\Delta R^2=0.003$, $p>0.05$), we can conclude that involvement does not have a moderating effect on the relationship between Confucian traditional values at workplace and employee satisfaction. Therefore, the hypothesis (H₂) that involvement can moderate the positive relationship between Confucian traditional values at workplace and employee satisfaction, and that the stronger the involvement, the weaker the positive effect of Confucian traditional values at workplace on employee satisfaction is not supported.

4.4.2.2 The moderating effect of consistency

The hierarchical regression analysis results of the moderating effect of consistency on the

relationship between Confucian traditional values at workplace and employee satisfaction are shown in Table 4.22.

Table 4.22 The moderating effect of consistency on the relationship between Confucian traditional values at workplace and employee satisfaction

Variables	Employee satisfaction		
	M ₃₂	M ₄₂	M ₅₂
Step1: control variables			
Age	0.264**	0.176*	0.178*
Educational level	-0.209**	-0.140*	-0.145*
Years of working	-0.001	-0.013	-0.013
Years of working for the current employer	-0.024	-0.012	-0.014
Step2: main effect			
Confucian traditional values at workplace		0.164*	0.203*
Consistency		1.050***	1.040***
Step3: interaction effect			
Consistency* Confucian traditional values at workplace			-0.059
ΔR^2		0.316***	0.003
R ²	0.060	0.376	0.379
F	6.110***	38.437***	33.344***

Note: n=390. *p<0.05. **p<0.01. ***p<0.001.

As can be seen from Table 4.22, when Confucian traditional values at workplace and consistency are added to M₃₂, represented as M₄₂, the value of R² has a significant increase ($\Delta R^2=0.316$, $p<0.001$), with the regression coefficients of 0.164 ($p<0.05$) and 1.050 ($p<0.001$) respectively, passing the t-test. This proves that Confucian traditional values at workplace and consistency have significantly positive effects on employee satisfaction.

When the interaction term of consistency and Confucian traditional values at workplace is added to M₄₂, represented as M₅₂, the regression coefficient becomes -0.059, which is negative but not significant ($p>0.05$). As neither the t-test is passed, nor R² is significantly improved ($\Delta R^2=0.003$, $p>0.05$), we can conclude that consistency does not have a moderating effect on the relationship between Confucian traditional values at workplace and employee satisfaction. Therefore, the hypothesis (H₃) that consistency can moderate the positive relationship between Confucian traditional values at workplace and employee satisfaction, and that the stronger the consistency, the weaker the positive effect of Confucian traditional values at workplace on employee satisfaction is not supported.

4.4.2.3 The moderating effect of adaptability

The hierarchical regression analysis results of the moderating effect of adaptability on the relationship between Confucian traditional values at workplace and employee satisfaction are

shown in Table 4.23.

Table 4.23 The moderating effect of adaptability on the relationship between Confucian traditional values at workplace and employee satisfaction

Variables	Employee satisfaction		
	M ₃₃	M ₄₃	M ₅₃
Step1: control variables			
Age	0.264**	0.254**	0.255**
Educational level	-0.209**	-0.097	-0.100
Years of working	-0.001	-0.010	-0.010
Years of working for the current employer	-0.024	-0.020	-0.022
Step2: main effect			
Confucian traditional values at workplace		0.248*	0.318**
Adaptability		0.893***	0.898***
Step3: interaction effect			
Adaptability* Confucian traditional values at workplace			-0.109*
ΔR^2		0.283***	0.011*
R ²	0.060	0.343	0.354
F	6.110***	33.268***	29.864***

Note. n=390. *p<0.05. **p<0.01. ***p<0.001.

As can be seen from Table 4.23, when Confucian traditional values at workplace and adaptability are added to the regression model M₃₃, represented as M₄₃, the value of R² has a significant increase ($\Delta R^2=0.283$, p<0.001), with the regression coefficients of 0.248(p<0.05) and 0.893(p<0.001) respectively, passing the t-test. This proves that Confucian traditional values at workplace and adaptability have significantly positive effects on employee satisfaction.

When the interaction term of adaptability and Confucian traditional values at workplace is added to M₄₃, represented as M₅₃, the regression coefficient becomes -0.109, which is significantly negative (p<0.05). As both the t-test is passed and R² is significantly improved ($\Delta R^2=0.011$, p<0.05), we can conclude that adaptability has a moderating effect on the relationship between Confucian traditional values at workplace and employee satisfaction. In organizations with high adaptability, the positive correlation between Confucian traditional values at workplace and employee satisfaction is relatively weaker, while in organizations with low adaptability, such correlation is relatively stronger. Therefore, the hypothesis (H₄) that adaptability can moderate the positive relationship between Confucian traditional values at workplace and employee satisfaction, and that the stronger the adaptability, the weaker the positive effect of Confucian traditional values at workplace on employee satisfaction is not rejected. Figure 4.5 is provided to illustrate the moderating effect of adaptability.



Figure 4.5 The moderating effect of adaptability on the relationship between Confucian traditional values at workplace and employee satisfaction

To gain a deeper understanding of how adaptability moderates the relationship between Confucian traditional values at workplace and employee satisfaction, we go further to test the moderating effects of its two indicators, i.e., creating change and organizational learning, on the relationship between Confucian traditional values at workplace and employee satisfaction.

The moderating effect of creating change

The hierarchical regression analysis results of the moderating effect of creating change on the relationship between Confucian traditional values at workplace and employee satisfaction are shown in Table 4.24.

Table 4.24 The moderating effect of creating change on the relationship between Confucian traditional values at workplace and employee satisfaction

Variables	Employee satisfaction		
	M ₃₃₁	M ₄₃₁	M ₅₃₁
Step1: control variables			
Age	0.264**	0.272**	0.277**
Educational level	-0.209**	-0.099	-0.106
Years of working	-0.001	-0.010	-0.011
Years of working for the current employer	-0.024	-0.019	-0.021
Step2: main effect			
Confucian traditional values at workplace		0.302*	0.364**
Creating Change		0.782***	0.781***
Step3: interaction effect			
Creating Change*Confucian traditional values at workplace			-0.098*
ΔR^2		0.257***	0.009*
R ²	0.060	0.317	0.326
F	6.110***	29.601***	26.368***

Note: n=390. *p<0.05. **p<0.01. ***p<0.001.

As can be seen from Table 4.24, when Confucian traditional values at workplace and

creating change are added to the regression model M_{331} , represented as M_{431} , the value of R^2 has a significant increase ($\Delta R^2=0.257$, $p<0.001$), with the regression coefficients of 0.302 ($p<0.05$) and 0.782 ($p<0.001$) respectively, passing the t-test. This proves that Confucian traditional values at workplace and creating change have significantly positive effects on employee satisfaction.

When the interaction term of creating change and Confucian traditional values at workplace is added to the regression model M_{431} , represented as M_{531} , the regression coefficient becomes -0.098, which is significantly negative ($p<0.05$). As both the t-test is passed and R^2 is significantly improved ($\Delta R^2=0.009$, $p<0.05$), we can conclude that creating change has a moderating effect on the positive relationship between Confucian traditional values at workplace and employee satisfaction. The stronger the creating change, the weaker such positive relationship. In organizations with stronger emphasis on creating change, the positive correlation between Confucian traditional values at workplace and employee satisfaction is relatively weaker, while in organizations with weaker creating change, such correlation is relatively stronger. Figure 4.6 is provided to illustrate the moderating effect of creating change.



Figure 4.6 The moderating effect of creating change on the relationship between Confucian traditional values at workplace and employee satisfaction

The moderating effect of organizational learning

The hierarchical regression analysis results of the moderating effect of organizational learning on the relationship between Confucian traditional values at workplace and employee satisfaction are shown in Table 4.25.

Table 4.25 The moderating effect of organizational learning on the relationship between Confucian traditional values at workplace and employee satisfaction

Variable	Employee satisfaction		
	M ₃₃₂	M ₄₃₂	M ₅₃₂
Step1: control variables			
Age	0.264**	0.208*	0.198*
Educational level	-0.209**	-0.174**	-0.168**
years of working	-0.001	-0.008	-0.007
Years of working for the current employer	-0.024	-0.030*	-0.031*
Step2: main effect			
Confucian traditional values at workplace		0.588***	0.625***
Organizational Learning		0.438***	0.443***
Step3: interaction effect			
Organizational Learning*Confucian traditional values at workplace			-0.075
ΔR^2		0.196***	0.005
R ²	0.060	0.256	0.261
F	6.110***	21.927***	19.270***

Note: n=390. *p<0.05. **p<0.01. ***p<0.001.

As can be seen from Table 4.25, when Confucian traditional values at workplace and organizational learning are added to the regression model M₃₃₂, represented as M₄₃₂, the value of R² has a significant increase ($\Delta R^2=0.196$, $p<0.001$), with the regression coefficients of 0.588 ($p<0.001$) and 0.438 ($p<0.001$) respectively, passing the t-test. This proves that Confucian traditional values at workplace and organizational learning have significantly positive effects on employee satisfaction.

When the interaction term of organizational learning and Confucian traditional values at workplace is added to M₄₃₂, represented as M₅₃₂, the regression coefficient becomes -0.075, which is negative but not significant ($p>0.05$). As neither the t-test is passed, nor R² is significantly improved ($\Delta R^2=0.005$, $p>0.05$), we can conclude that organizational learning does not have a moderating effect on the relationship between Confucian traditional values at workplace and employee satisfaction.

The test results of the moderating effects of the two indicators of adaptability, i.e., creating change and organizational learning show that the moderating effect of adaptability on the relationship between Confucian traditional values at workplace and employee satisfaction is attributable to creating change, and not to organizational learning. Adaptability moderates the relationship between Confucian traditional values at workplace and employee satisfaction through creating change.

4.4.2.4 The moderating effect of mission

The hierarchical regression analysis results of the moderating effect of mission on the relationship between Confucian traditional values at workplace and employee satisfaction are

shown in Table 4.26:

Table 4.26 The moderating effect of mission on the relationship between Confucian traditional values at workplace and employee satisfaction

Variable	Employee satisfaction		
	M ₃₄	M ₄₄	M ₅₄
Step1: control variables			
Age	0.264**	0.192*	0.184*
Educational level	-0.209**	-0.134*	-0.139*
years of working	-0.001	-0.009	-0.009
Years of working for the current employer	-0.024	-0.020	-0.023
Step2: main effect			
Confucian traditional values at workplace		0.219*	0.304*
Mission		1.088***	1.095***
Step3: interaction effect			
Mission*Confucian traditional values at workplace			-0.108**
ΔR^2		0.322***	0.012**
R^2	0.060	0.381	0.393
F	6.110***	39.339***	35.330***

Note: n=390. *p<0.05. **p<0.01. ***p<0.001.

As can be seen from Table 4.26, when Confucian traditional values at workplace and mission are added to the regression model M₃₄, represented as M₄₄, the value of R^2 has a significant increase ($\Delta R^2=0.322$, $p<0.001$), with the regression coefficients of 0.219 ($p<0.05$) and 1.088 ($p<0.001$) respectively, passing the t-test. This proves that Confucian traditional values at workplace and mission have significantly positive effects on employee satisfaction.

When the interaction term of mission and Confucian traditional values at workplace is added to M₄₄, represented as M₅₄, the regression coefficient becomes -0.108, which is significantly negative ($p<0.01$). As both the t-test is passed and R^2 is significantly improved ($\Delta R^2=0.012$, $p<0.01$), we can conclude that mission has a moderating effect on the relationship between Confucian traditional values at workplace and employee satisfaction. In organizations with stronger sense of mission, the positive correlation between Confucian traditional values at workplace and employee satisfaction is relatively weaker, while in organizations with weaker mission, such correlation is relatively stronger. Therefore, hypothesis (H₅) that mission can moderate the positive relationship between Confucian traditional values at workplace and employee satisfaction, and that the stronger the mission, the weaker the positive effect of Confucian traditional values at workplace on employee satisfaction is confirmed. Figure 4.7 is provided to illustrate the moderating effect of mission.

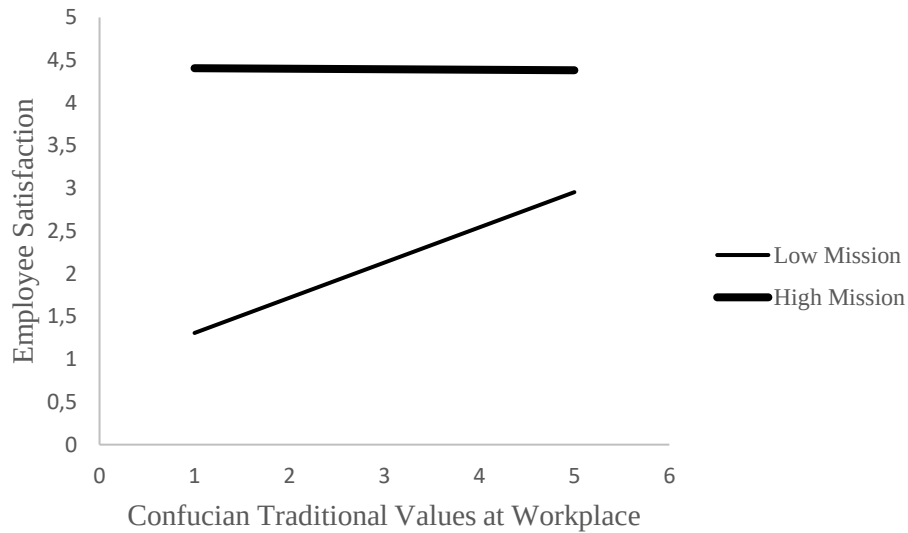


Figure 4.7 The moderating effect of mission on the relationship between Confucian traditional values at workplace and employee satisfaction

To gain a deeper understanding of how mission moderates the relationship between Confucian traditional values at workplace and employee satisfaction, we go further to test the moderating effects of its three indicators, i.e., strategic direction and intent, goals and objectives, and vision, on the relationship between Confucian traditional values at workplace and employee satisfaction.

The moderating effect of strategic direction and intent

The hierarchical regression analysis results of the moderating effect of strategic direction and intent on the relationship between Confucian traditional values at workplace and employee satisfaction are shown in Table 4.27.

Table 4.27 The moderating effect of strategic direction and intent on the relationship between Confucian traditional values at workplace and employee satisfaction

Variables	Employee satisfaction		
	M ₃₄₁	M ₄₄₁	M ₅₄₁
Step1: control variables			
Age	0.264**	0.202*	0.193*
Educational level	-0.209**	-0.173**	-0.179**
Years of working	-0.001	-0.010	-0.009
Years of working for the current employer	-0.024	-0.024	-0.027*
Step2: main effect			
Confucian traditional values at workplace		0.453***	0.548***
Strategic Direction & Intent		0.763***	0.755***
Step3: interaction effect			
Strategic Direction & Intent*Confucian traditional values at workplace			-0.109*
ΔR^2		0.243***	0.012*
R^2	0.060	0.303	0.315
F	6.110***	27.748***	25.059***

Note: n=390. *p<0.05. **p<0.01. ***p<0.001.

As can be seen from Table 4.27, when Confucian traditional values at workplace and strategic direction and intent are added to the regression model M_{341} , represented as M_{441} , the value of R^2 has a significant increase ($\Delta R^2=0.243$, $p<0.001$), with the regression coefficients of 0.453 ($p<0.001$) and 0.763 ($p<0.001$) respectively, passing the t-test. This proves that Confucian traditional values at workplace and strategic direction and intent have significantly positive effects on employee satisfaction.

When the interaction term of strategic direction and intent and Confucian traditional values at workplace is added to the regression model M_{441} , represented as M_{541} , the regression coefficient becomes -0.109, which is significantly negative ($p<0.05$). As both the t-test is passed and R^2 is significantly improved ($\Delta R^2=0.012$, $p<0.05$), we can conclude that strategic direction and intent have a moderating effect on the positive relationship between Confucian traditional values at workplace and employee satisfaction. The stronger the strategic direction and intent, the weaker such positive relationship. In organizations with high strategic direction and intent, the positive correlation between Confucian traditional values at workplace and employee satisfaction is relatively weaker, while in organizations with low strategic direction and intent, such correlation is relatively stronger. Figure 4.8 is provided to illustrate the moderating effect of strategic direction and intent.

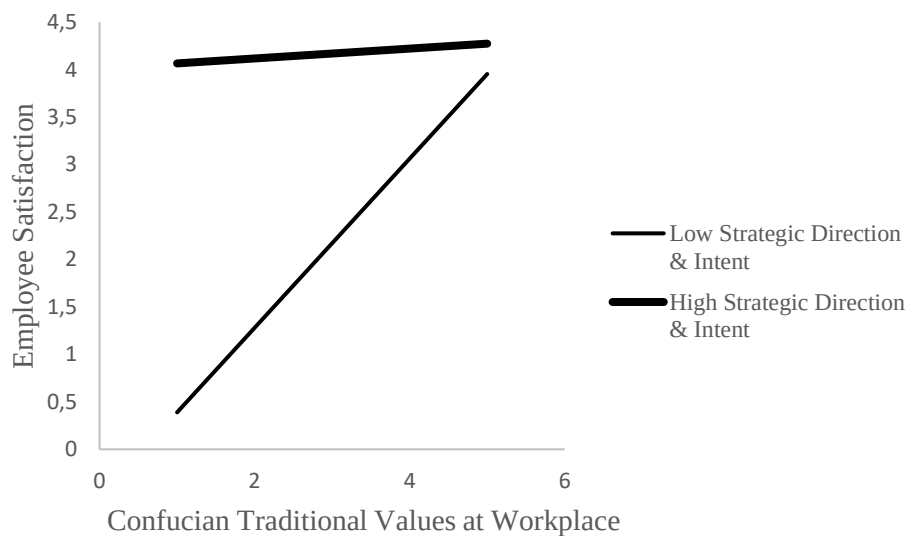


Figure 4.8 The moderating effect of strategic direction and intent on the relationship between Confucian traditional values at workplace and employee satisfaction

The moderating effect of goals and objectives

The hierarchical regression analysis results of the moderating effect of goals and objectives on the relationship between Confucian traditional values at workplace and employee satisfaction are shown in Table 4.28.

Table 4.28 The moderating effect of goals and objectives on the relationship between Confucian traditional values at workplace and employee satisfaction

Variables	Employee satisfaction		
	M ₃₄₂	M ₄₄₂	M ₅₄₂
Step1: control variables			
Age	0.264**	0.215*	0.210*
Educational level	-0.209**	-0.133*	-0.136*
Years of working	-0.001	-0.009	-0.009
Years of working for the current employer	-0.024	-0.018	-0.020
Step2: main effect			
Confucian traditional values at workplace		0.271*	0.334**
Goals & Objectives		0.974***	0.993***
Step3: interaction effect			
Goals & Objectives*Confucian traditional values at workplace			-0.095*
ΔR^2		0.285***	0.008*
R ²	0.060	0.345	0.353
F	6.110***	33.591***	29.797***

Note: n=390. *p<0.05. **p<0.01. ***p<0.001.

As can be seen from Table 4.28, when Confucian traditional values at workplace and goals and objectives are added to the regression model M₃₄₂, represented as M₄₄₂, the value of R² has a significant increase ($\Delta R^2=0.285$, $p<0.001$), with the regression coefficients of 0.271 ($p<0.05$) and 0.974 ($p<0.001$) respectively, passing the t-test. This proves that Confucian traditional values at workplace and goals and objectives have significantly positive effects on employee satisfaction.

When the interaction term of goals and objectives and Confucian traditional values at workplace is added to the regression model M₄₄₂, represented as M₅₄₂, the regression coefficient becomes -0.095, which is significantly negative ($p<0.05$). As both t-test is passed and R² is significantly improved ($\Delta R^2=0.008$, $p<0.05$), we can conclude that goals and objectives has a moderating effect on the positive relationship between Confucian traditional values at workplace and employee satisfaction. The stronger the goals and objectives, the weaker such positive relationship. In organizations with high goals and objectives, the positive correlation between Confucian traditional values at workplace and employee satisfaction is relatively weaker, while in organizations with low goals and objectives, such correlation is relatively stronger. Figure 4.9 is provided to illustrate the moderating effect of goals and objectives.



Figure 4.9 The moderating effect of goals and objectives on the relationship between Confucian traditional values at workplace and employee satisfaction

The moderating effect of vision

The hierarchical regression analysis results of the moderating effect of vision on the relationship between Confucian traditional values at workplace and employee satisfaction are shown in Table 4.29.

Table 4.29 The moderating effect of vision on the relationship between Confucian traditional values at workplace and employee satisfaction

Variables	Employee satisfaction		
	M ₃₄₃	M ₄₄₃	M ₅₄₃
Step1: control variables			
Age	0.264**	0.189*	0.184*
Educational level	-0.209**	-0.124*	-0.127*
Years of working	-0.001	-0.008	-0.008
Years of working for the current employer	-0.024	-0.024	-0.026*
Step2: main effect			
Confucian traditional values at workplace		0.235*	0.290*
Vision		0.948***	0.948***
Step3: interaction effect			
Vision*Confucian traditional values at workplace			-0.089*
ΔR^2		0.328***	0.008*
R^2	0.060	0.387	0.395
F	6.110***	40.333***	35.669***

Note. n=390. *p<0.05. **p<0.01. ***p<0.001.

As can be seen from Table 4.29, when Confucian traditional values at workplace and vision are added to the regression model M₃₄₃, represented as M₄₄₃, the value of R^2 has a significant increase ($\Delta R^2=0.328$, $p<0.001$), with the regression coefficients of 0.235 ($p<0.05$) and 0.948

($p < 0.001$) respectively, passing the t-test. This proves that Confucian traditional values at workplace and vision have significantly positive effects on employee satisfaction.

When the interaction term of vision and Confucian traditional values at workplace is added to the regression model M_{443} , represented as M_{543} , the regression coefficient becomes -0.089, which is significantly negative ($p < 0.05$). As both the t-test is passed and R^2 is significantly improved ($\Delta R^2 = 0.008$, $p < 0.05$), we can conclude that vision has a moderating effect on the positive relationship between Confucian traditional values at workplace and employee satisfaction. The stronger the vision, the weaker such positive relationship. Among the organizations studied, in those with higher vision, the positive correlation between Confucian traditional values at workplace and employee satisfaction is relatively weaker, while in organizations with low vision, such correlation is relatively stronger. Figure 4.10 is provided to illustrate the moderating effect of vision.

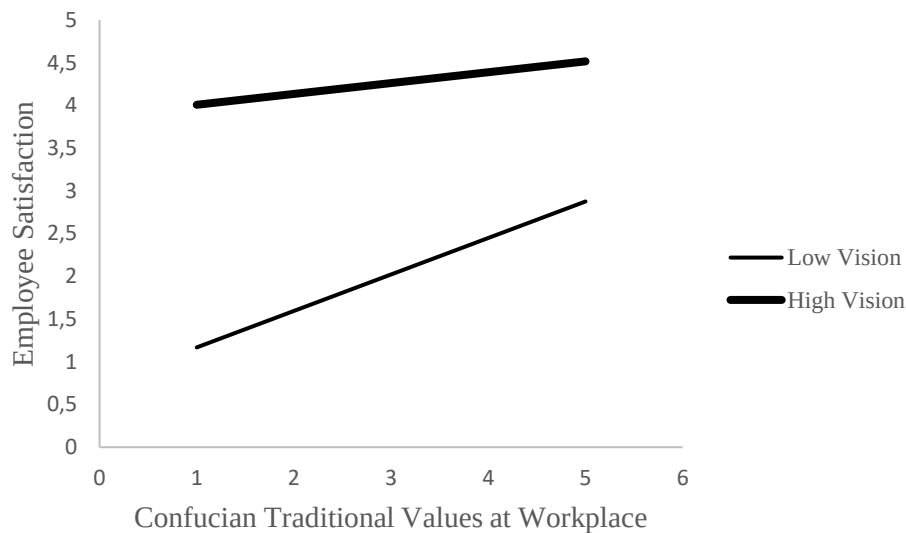


Figure 4.10 The moderating effect of vision on the relationship between Confucian traditional values at workplace and employee satisfaction

The test results of the moderating effects of the three indicators of mission, i.e., strategic direction and intent, goals and objectives and vision show that the moderating effect of mission on the relationship between Confucian traditional values at workplace and employee satisfaction is attributable to all three indicators. Mission moderates the relationship between Confucian traditional values at workplace and employee satisfaction through all three indicators. The test results also show that the regression coefficient of the interaction term of strategic direction and intent and Confucian traditional values at workplace is -0.109, that of goals and objectives and Confucian traditional values at workplace -0.095, and that of vision and Confucian traditional values at workplace -0.089. This demonstrates that among the three

indicators, strategic direction and intent has the strongest moderating effect on the relationship between Confucian traditional values at workplace and employee satisfaction, followed by goals and objectives, and then vision, whose moderating effect is the weakest.

4.5 Summary of the hypotheses test

Based on the theoretical and empirical analysis, we have summarized test results of the hypotheses proposed in this research, as shown in Table 4.30.

Table 4.30 Test results of the hypotheses on the relationship between Confucian traditional values at workplace, organizational culture and employee satisfaction

Research hypotheses	Test results
H ₁ : Confucian traditional values at workplace have a positive effect on employee satisfaction	Supported
H ₂ : Involvement can moderate the positive relationship between Confucian traditional values at workplace and employee satisfaction. The stronger the involvement, the weaker the positive effect of Confucian traditional values at workplace on employee satisfaction.	Not supported
H ₃ : Consistency can moderate the positive relationship between Confucian traditional values at workplace and employee satisfaction. The stronger the consistency, the weaker the positive effect of Confucian traditional values at workplace on employee satisfaction.	Not supported
H ₄ : Adaptability can moderate the positive relationship between Confucian traditional values at workplace and employee satisfaction. The stronger the adaptability, the weaker the positive effect of Confucian traditional values at workplace on employee satisfaction.	Supported
H ₅ : Mission can moderate the positive relationship between Confucian traditional values at workplace and employee satisfaction. The stronger the mission, the weaker the positive effect of Confucian traditional values at workplace on employee satisfaction.	Supported

The hypotheses test results of the research is illustrated in Figure 4.11:

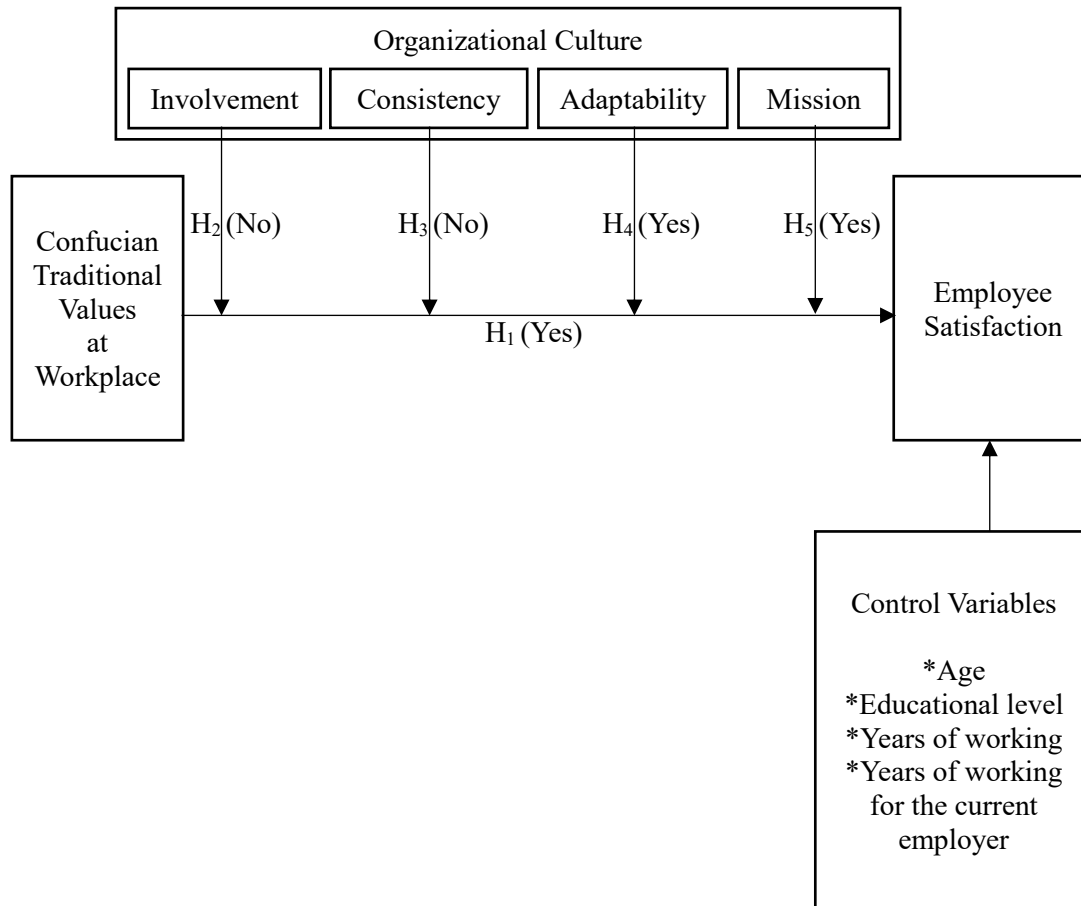


Figure 4.11 Hypotheses test results

Through regression analysis, we have found that organizational culture has a moderating effect on the relationship between Confucian traditional values at workplace and employee satisfaction, which is novel compared to previous research. However, in our sample, such moderating effect is attributable to certain (and not all) dimensions of organizational culture. The empirical results show that its four dimensions, i.e., involvement, consistency, adaptability, and mission, play different roles in the moderation: adaptability and mission contribute to the moderating effect while involvement and consistency are irrelevant. Organizational culture moderates the relationship between traditional values at workplace and employee satisfaction through adaptability and mission. In the next chapter we will further explain and discuss these empirical results.

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Chapter 5: Discussion of Results and Conclusions

This chapter discusses the research results and explains the implications for the practice of management in large pharmaceutical distribution enterprises in China through the study of one of the four existing companies in this sector. The limitations of the research are also discussed, and suggestions for future research are proposed.

5.1 Research results

Based on the theoretical framework, this study analyzes the relationship between Confucian traditional values at workplace, organizational culture, and employee satisfaction. It also proposes to explore whether and how organizational culture – considering Denison's four dimensions (Denison & Mirsha, 1995) – plays a moderating role in this relationship. To gain an in-depth understanding of the subject these concepts have been analyzed one by one to test the proposed hypotheses. The results are as follows:

(1) Confucian traditional values at workplace

It can be seen from the difference analysis of Confucian traditional values at workplace that the results vary significantly depending on employees' gender, age, educational background, job category and position level, since they have different scores. The relevant research on this subject in China is quite scarce but some literature we have reviewed as referred in Chapter 2 reached different conclusions. Q. Wang and Zhang (2012), for example, studied companies and institutions in Beijing and Tianjin and found that employees of different gender, age, position level and educational background show no significant differences in Confucian traditional values at workplace. In turn, Ma (2016) conducted research on companies in southwestern China and also found that there are no significant differences in Confucian traditional values at workplace considering the same demographic variables. This inconsistency may be due to the use of different samples, but it is in itself a subject meriting further study.

In our sample of 445 respondents working for a large pharmaceutical distributor in Guangdong Province results show that the mean values of Confucian traditional values at workplace do vary across different employee groups. For example: (a) the score of male employees is higher than that of women; (b) older employees have higher scores; (c) the score of employees whose educational background is high school and below is relatively high,

compared to employees with an associate bachelor degree or higher; (d) the score of employees engaged in logistics is relatively high, while that of employees engaged in procurement is relatively low; (e) the score of senior managers is relatively high, while that of employees in junior management positions is relatively low. The mean scores of Confucian traditional values at workplace of all the employees are greater than 3, regardless of their gender, age, educational background, job category, and position level, which is consistent with Wang's (2012) and Ma's (2016) research, indicating that Confucian traditional values at workplace are highly relevant and deeply embedded in the work of Chinese employees and is thus a concept worth of further exploration.

(2) Employee satisfaction

The difference analysis of employee satisfaction shows that results vary significantly by age and educational background, which means that employees of different age and educational background have different levels of employee satisfaction. However, there is no significant difference among employees of different gender, job category and position level. The mean values of employee satisfaction among different employee groups show that: (a) the score increases as employees get older, with those less than 20 years old having the lowest job satisfaction, and those over 50 years old having the highest job satisfaction; (b) employee satisfaction decreases as educational level gets higher since, in our sample, employees with educational background of high school and below have the highest job satisfaction, while those with a master degree have the lowest.

Studies on job satisfaction in China are abundant and diversified. Research by Shen (2014), for example, showed that employee satisfaction varies significantly depending on age and educational level, which is consistent with our study. However, W. Sun (2021) research concurs with ours in terms of age but not in what concerns educational level. His results showed that employees over 60 years old and those with a bachelor's degree or above have the highest employee satisfaction, while those with a junior high school diploma have the lowest. Such differences may be due to different ways of grouping. The interval of different age groups is 16 years in Sun Wenrong's research, and 10 years in our study. The educational background in this research ranges from high school or below to master's degree and above, which seems to be more adequate for the characteristics of our sample.

(3) Organizational culture

When comparing the results of the eight companies surveyed, they differ significantly in the four traits of the constructs either in involvement, consistency, adaptability, or mission. The difference is largest in the consistency dimension, and smallest in involvement. The scores of

the seventh company (Meheco Pharmaceutical, Dongguan) in involvement, consistency, adaptability, and mission are higher than those of other companies, while those of the first company (China Meheco Guangdong Pharmaceutical) are always lower in any of the four dimensions. We need however to consider that the size of the sample is different among the 8 companies, depending on the total number of employees existing in each one of them. This is an alert to the interpretation of the data.

The average values of organizational culture of all eight companies are higher than 3 indicating that, in general, the employees surveyed have a positive attitude towards the culture of the organization. This points to the importance that organizational culture has in influencing the management in this type of companies. Among the abundant research on organizational culture in China, we notice that, according to J. Gu (2016) the dimensions of involvement and adaptability are not as powerful as mission and consistency. More recently, research conducted by Ge (2021) also indicates that mission is the strongest among the four dimensions while adaptability is relatively weak. A different result was obtained by Lu (2020) whose research showed that mission and consistency are relatively weak dimensions while adaptability is relatively strong. The differences in research results may be due to the disparities in the types of companies under study, and the different strategic goals they have. They also point out to the need of continuing to research this topic not only to find some pattern but also to monitor the evolution.

(4) Analysis of the research hypotheses

After hypothesis testing, some but not all of the hypotheses proposed in the research have been supported. Hypothesis 1, which proposes that Confucian traditional values at workplace has a positive effect on employee satisfaction, is supported which is in line with the literature. as the results show that Confucian traditional values at workplace positively affect employee satisfaction in a significant manner. Considering that employee satisfaction is a great contributor to organizational performance, this finding concurs with results presented in a very recent article by Z. H. Gu et al. (2022) that Confucianism is associated with higher profitability and growth.

Hypothesis 2 proposes that involvement moderates the positive relationship between Confucian traditional values at workplace and employee satisfaction while hypothesis 3 suggests that consistency moderates the positive relationship between Confucian traditional values at workplace and employee satisfaction. These two hypotheses are not supported. We contend that the contents of these two traits as expressed in the Organizational Culture Survey that we used as a scale reflect more Western values and may not be aligned with the four

dimensions of Confucian traditional values at workplace considered (see Chapter 3): respect and compliance to authority, tolerance and altruism, acceptance of authority and face. In turn, hypothesis 4, which proposes that adaptability moderates the positive relationship between Confucian traditional values at workplace and employee satisfaction, and hypothesis 5, considering that mission moderates the positive relationship between Confucian traditional values at workplace and employee satisfaction, are supported.

Through hierarchical regression analysis of the moderating effect of the four dimensions of organizational culture on the relationship between Confucian traditional values at workplace and employee satisfaction, it was found that the stronger the mission and adaptability, the less the positive impact of Confucian traditional values at workplace on employee satisfaction. However, we believe that these two dimensions of organizational culture moderate the relationship between Confucian traditional values at workplace and employee satisfaction in different ways. To a certain extent, adaptability and Confucian traditional values at workplace have some conflicts (for example, creating change, an indicator of adaptability), which hampers the positive relationship between Confucian traditional values at workplace and employee satisfaction. On the other hand, mission, and its role of providing a clear direction and goals, contains a connotation that to some extent overlaps with Confucian traditional values at workplace, which tones down the positive relationship between this construct and employee satisfaction. In the end, both dimensions contribute to the moderating effect of organizational culture: the stronger the mission and adaptability, the less the positive impact of Confucian traditional values at the workplace on employee satisfaction.

As, to our best knowledge, the existing research in China on the moderating role of organizational culture in the relationship between Confucian traditional values at workplace, and employee satisfaction, we will compare the results of this research with those of the studies on the relationship between Confucian traditional values at workplace and employee satisfaction, and between organizational culture and employee satisfaction. As such, Liu(2013) conducted a related survey on employees of private companies, and results showed that Confucian values have a significant, positive, and predictive effect on employee satisfaction, that is, the stronger the employee's Confucian values, the higher the job satisfaction. This is consistent with the results of this research. Research by Li (2016) on employees of a joint venture company in the United States found that organizational culture is significantly and positively correlated with employees' internal and external satisfaction, the higher the organizational culture, the higher the employee satisfaction. J. Chen's (2017) empirical research found that the two dimensions of organizational culture, i.e., involvement and consistency have

positive impacts on employee satisfaction, especially that of younger employees. In this thesis, we found that there is no moderating effect of these two dimensions on the relationship between Confucian traditional values and employee satisfaction which does not contradict the former research since that one did not concern Confucian traditional values.

5.2 Discussion

5.2.1 The positive correlation between Confucian traditional values at workplace and employee satisfaction

The research results show that Confucian traditional values at workplace significantly and positively affect employee satisfaction, mainly through its three dimensions, namely tolerance and altruism, acceptance of authority and respect and compliance to authority. The essence of Confucian traditional values is a relationship orientation centered on harmony, including not only the relationship among employees themselves, but also the relationship between the superior and subordinate. Under the influence of such orientation, employees tend to develop positive interactions at workplace, which are manifested in the following two aspects:

Firstly, besides fulfilling their duties, employees also attach importance to building a harmonious relationship with their colleagues, superiors, senior fellows, and the organization. In observing the traditional virtues of Confucianism, employees will extend the love of family members to their colleagues, superiors, and the organization. They tend to be kind, friendly and considerate to others, accommodate the mistakes made by other people, and try to avoid conflicts to maintain harmonious interpersonal relationships. In such an atmosphere, employees impart a positive mood, and achieve greater efficiency and performance in their work, resulting in higher employee satisfaction.

Secondly, Confucianism has a clear definition of ethical relationships on the basis of its five virtues: Ren (benevolence), Yi (righteousness), Li (courteousness), Zhi (wisdom), and Xin (trustworthiness). It also puts forward the “five cardinal relationships”, namely, the relationships between the emperor and minister, between father and son, between siblings, between husband and wife, and between friends. Except for the relationship between friends, all of them feature interdependence and inequality between the superior and subject, where the party of the lower level should respect and obey the authority at the higher level. By the same token, the higher-level authority should care about and support the subordinate. The Confucian ethical relationship is also applied to the workplace, where employees will consider the

organization and the superior as authoritative. Therefore, they tend to consult the leaders or senior employees when making decisions, respect major decisions made by the organization and the leadership and accept their arrangements. Employees believe that the leader will put himself in their shoes and make the best arrangement for them. Also, employees will strictly follow the hierarchical order and obey the leader's task assignment at workplace, which contributes to a harmonious and relaxing working atmosphere within the organization and higher employee satisfaction and performance.

Based on the above analysis, employees with higher levels of Confucian traditional values at workplace tend to attach greater importance to harmonious relationships at workplace, which will translate into more harmonious relationships among employees, between the superior and subordinate, and within the organization, smoother cross-departmental communication and cooperation, and a greater sense of gains and satisfaction. Employee satisfaction is not only about the work itself, but also the perception and evaluation of the working environment. As a result, Confucian traditional values at workplace positively affect employee satisfaction. The higher the Confucian traditional values at workplace, the higher the employee satisfaction.

5.2.2 Adaptability as a moderator between Confucian traditional values at workplace and employee satisfaction

Organizations with stronger adaptability tend to pay more attention to flexibility and the external environment. They can adjust themselves with agility in response to environmental changes and embrace innovation and organizational change. Adaptability includes three indicators: creating change, organizational learning, and customer focus. To further understand the mechanism of adaptability as a moderator and ensure the reliability of the scale, this study conducted an in-depth analysis of creating change and organizational learning in Chapter 2. Creating change means the organization can stay sensitive to changes in the market environment and stand ready to try new methods and new ideas; organizational learning means that the organization pays attention to the experience of failures and transforms such experience into opportunities, and they can improve the overall learning level of the organization through incentivizing innovation.

This study explains how adaptability moderates the relationship between Confucian traditional values at workplace and employee satisfaction by analyzing its two indicators, namely, creating change and organizational learning. The results show that adaptability moderates the relationship between Confucian traditional values at workplace and employee satisfaction through creating change. Confucian traditional values are rich in management

philosophy, but conservative in nature due to their historical background. Respecting hierarchy and authority, Confucian traditional values view the relationship between the superior and subordinate as a contractual relationship, where the later should follow the former's leadership and the former should always take the later into consideration. Under this circumstance, the subordinate will become more conservative, less creative, and lacking innovation. Creating change is about flexible and advanced working methods, the willingness to embrace transformation, and timely response to the changing environment. The inherent conservatism in traditional Confucian values might conflict with adaptability, resulting in its moderating effect on the relationship between Confucian traditional values at workplace and employee satisfaction. The higher the scores of creating change, the weaker the positive relationship between Confucian traditional values at workplace and employee satisfaction, and vice versa.

It is worth noting that organizational learning does not moderate the relationship between Confucian traditional values at workplace and employee satisfaction. This may be due to the emphasis on introspection and learning of Confucian traditional values.

5.2.3 Mission as a moderator between Confucian traditional values at workplace and employee satisfaction

Organizations with strong mission tend to pay more attention to the stability of the organization and the external environment, which can tell whether the company is more concerned about immediate interests or longer-term business goals. Successful organizations usually have clear and consistent goals and vision, which are highly recognized and fully known by their employees. They make their career development plans consistent with the organization's vision, which will consolidate the cohesion and unity of the organization.

In this study mission includes three indicators - strategic direction and intent, vision, and goals and objectives – to unveil how mission plays a moderating role. The results show that the moderating effects of the three indicators on the relationship between Confucian traditional values at workplace and employee satisfaction are different in strength, with strategic direction and intent the strongest, followed by goals and objectives, and then vision. Strategic direction and intent reflect the development goals that the organization expects to achieve in the industry. A clearly defined strategic position of the organization can direct employees to develop personal goals. Vision represents the organization's core values, which points to the development direction of the organization that is shared by all its members. Goals and objectives are clear and actionable targets formulated on the basis of the vision as a guidance to employees' work.

Influenced by Confucian traditional values, managers at the upper levels of the hierarchy will fully accept the strategy formulated by the top leadership and deploy work consistent with the organization's development strategy and goals. Meanwhile, they will manage their subordinates with kindness and benevolence and respect their value realization in work. Managers tend to formulate detailed, specific, and achievable objectives for employees, and specify the areas that need improvement so as to support the employees' self-realization. The employees, as the subordinate, are inclined to obey and accept authority, and highly recognize the development strategy and values of the organization. Ready to follow the leadership and accept the assignments, they assume that the leaders will provide them with instructions on working methods and guidelines. From this perspective, Confucian traditional values and organizational culture are largely consistent, resulting in mission in inverse proportion to the positive effect of Confucian traditional values at workplace on employee satisfaction.

5.3 Implications for management

This research studies the relationship among organizational culture, Confucian traditional values at workplace, and employee satisfaction, focusing on how organizational culture plays a moderating role between Confucian traditional values at workplace and employee satisfaction. Permeating throughout the enterprise, Confucian traditional values are directly reflected in the organizational culture. As embodying the internal values of an enterprise, though organizational culture cannot directly create economic benefits for the organization, it can directly affect the attitudes and behaviors of employees, and indirectly affect employee satisfaction through management behaviors.

Therefore, in the Chinese context, the study of organizational culture and Confucian traditional values at workplace is of great significance to employee satisfaction. Based on the results of this research, the following suggestions are proposed:

5.3.1 Implementing a differentiated human resources management strategy

According to this study employee satisfaction is not only affected by organizational culture and Confucian traditional values at workplace, but also varies by age and education level, an issue that should be considered in human resources management prompting companies to adopt a differentiated human resource management strategy. Managers should understand the differences in employee satisfaction considering their different age groups and educational backgrounds and treat them appropriately. Having in mind the specific needs of different

employee groups, managers should combine material and spiritual incentives to fully tap the potential of employees. It is suggested that motivation theories such as Maslow's hierarchy of needs can be combined with Confucian traditional values as references for employee management in China. For example, before paying attention to job promotion, younger and less educated employees are more concerned about their basic needs for living. To enhance their satisfaction, the organization should first provide them with material remuneration that meets these basic living needs as advocated by the Confucian thought of benevolence (Ren). Then, the organization should create a home-like workplace for employees to meet their needs for the sense of belonging following the principle of righteousness (Yi). For elderly and better-educated employees, material incentives alone are not sufficient to improve their job satisfaction. Other measures related to spiritual incentives are advised to be adopted, such as job promotion, compliments, and commendation, and providing a pleasant working environment, to stimulate their enthusiasm and innovation, realize their self-worth, and meet their higher-level needs. All these comply with the Confucian thought of Zhi (wisdom).

5.3.2 Creating organizational culture that boosts employee satisfaction

Employee satisfaction concerns the perception and evaluation employees have of their work and work environment, which directly affects their attitudes and behaviors. To improve it, organizations should create and cultivate an organizational culture that boosts employee satisfaction which in turn will lead to positive attitudes and behaviors of employees, which can be translated into higher work efficiency and greater organizational performance. Secondly, the organization should build an enabling organizational culture. The results of this study reveal that in Meheco Guangdong, the scores of consistency, one of the four dimensions of organizational culture that we have considered, varies greatly across different employee groups (see Table 4.19). As detailed in Chapter 2, consistency relates to the creation of internal systems that promote highly committed employees, suggesting that managers should strengthen the cohesion within the organization, which can be achieved through such methods as promoting cross-departmental communication and collaboration, strengthening the coordination ability of managers, and building the values shared by all employees.

Thirdly, the organization should encourage all employees to participate in and contribute to the construction of organizational culture. On the one hand, the organization's vision, mission, and values should be communicated to all employees to improve their sense of identity with the culture of the organization; on the other hand, it is necessary to arouse employees' engagement awareness, so that they can form an in-depth perception of organizational culture, which will

translate into higher employee satisfaction. Fourthly, there should be in place a mechanism for the adjustment of organizational culture. Organizational culture needs to be dynamically adjusted according to the organization's development stage, goals, development strategy, and vision. A frozen organizational culture will lead to a rigid organization lacking innovation and vitality.

5.3.3 Building an organizational culture based on Confucian traditional values

The results of this study show that Confucian traditional values at workplace overlap to some extent with the concept and principles of organizational culture. Therefore, in Chinese organizations, integrating them will help to create a harmonious culture in the organization, not only improving employee satisfaction, but also attracting more talents to join. Confucian traditional values contain rich management ideas which should be taken into consideration when managers cultivate organizational culture: Firstly, Ren (benevolence) and people-oriented thinking should be integrated into management. The love of family members advocated in Confucian traditional values may be generalized to the love of colleagues. Managers should fully recognize the importance of employees in the organization, listen to their needs and opinions in daily management, place employees at an important position in organizational development, and build an effective mechanism in cultivating, utilizing, and retaining talents. Secondly, the Confucian virtue of integrity or righteousness (Yi) can be viewed as the foundation of organizational culture. It may be used to discipline the behaviors of employees, guide their work and maintain the image of the organization as an essential part of corporate values, ethics and culture. Thirdly, the Chinese characteristic of collectivism (G. H. Hofstede et al., 2010) should be advocated as part of corporate values. Managers should promote teamwork, respect the personal interests of employees, and encourage them to stay committed to their job responsibilities, follow organizational goals and leadership, and coordinate the relationship between personal and collective interests, as well as immediate and long-term interests.

5.3.4 Establishing an incentive mechanism that can improve employee satisfaction

The incentive measures adopted by the organization directly affect employees' work enthusiasm, which in turn affects employee satisfaction. According to the results presented in this thesis most of the employees of Meheco Guangdong are well-educated (with a bachelor's degree or above) managers should focus more on their high-level needs. According to the

achievement motivation theory (McClelland, 1976), managers should set challenging goals and use spiritual rewards as incentives to satisfy their employees high-level needs. A harmonious and relaxing work environment is also needed to enhance employees' sense of belonging and let their voices be heard. According to the principle and mechanism of incentives expressed in the expectancy theory (Vroom, 1964), managers should set specific and achievable goals for employees, and strengthen the supervision and control over the process of goal completion, which is well accepted in the Chinese context under the Confucian traditional value of acceptance and compliance with authority.

5.3.5 Enhancing employees' recognition of Confucian traditional values

The factors related to the work itself and the factors related to the work environment both affect employee satisfaction. The former mainly include work pressure and work remuneration, and the later refer to the relationships among employees and between employees and their superiors, and the characteristics of the workplace. Employees with different cultures and values may have different understanding of these factors, leading to different levels of employee satisfaction. In this thesis results show that the stronger the Confucian traditional values at workplace, the higher the employee satisfaction. As most of the respondents at Meheco Guangdong are at non-management or low-management levels, managers should spread Confucian traditional values among them so that they can absorb such notions as benevolence (Ren), righteousness (Yi), and courteousness (Li). This will enable employees to have a higher level of hygiene factors (F. Herzberg et al., 1959) obey the decisions and arrangements made by the organization and give priority to the collective interests of the organization. Promoting Confucian traditional values among employees in China, who have long been exposed to such principles, will also deepen their understanding of the work rewards and assignments, lift motivating factors, and improve job satisfaction.

5.4 Research contribution

In the literature review of the research, it is found that there are abundant prior studies on the relationship between organizational culture and employee satisfaction, as well as some research on the role of Confucian traditional values at workplace. However, the literature on the relationships among the three variables is scarce, and not much attention has been paid to the moderating role played by organizational culture in the link between Confucian traditional values at workplace and employee satisfaction. This thesis contributes to the discussion by

incorporating organizational culture as a moderator between Confucian traditional values at workplace and employee satisfaction in a single research framework.

As we have seen in Chapters 1 and 3, the pharmaceutical distribution sector has been the focus of healthcare reform and regulation in recent years. Meheco Guangdong, the target company in the studies is controlled by China General Technology (Group) Holding Co Ltd, a state-owned enterprise administered by the central government of China. Research on organizational culture, Confucian traditional values at workplace, and employee satisfaction of such companies is limited, this study can be used as a reference for companies of the similar type to assist in building an effective organizational culture and improve employee satisfaction.

This thesis may enrich the empirical research on organizational culture as there are relatively few studies on its role in the relationship between Confucian traditional value at workplace and employee satisfaction. Data were collected through a questionnaire survey administered to the employees of a pharmaceutical distribution company and its subsidiaries in the southern part of Guangdong province and were processed through regression analysis according to the research design. Although other methods, like structural equation modelling, might have been used to process our data considering the non-observable (latent) nature of the constructs, we opted for regression analysis which continues to be widely used to test effects such as those we analyzed in this thesis.

5.5 Research limitations and prospects of future research

Due to the complexity of the research problem, limited time and data, this research has some limitations that may be improved in future research.

5.5.1 Limitations of variable measurement

When measuring employee satisfaction, this study views it as a dichotomous variable, with only two measurement results, i.e., satisfaction and dissatisfaction. The dimensions and structure of employee satisfaction can be explored and measured through overall evaluation methods and more in-depth analysis.

Future research can consider in more detail the influencing factors as well as the model and structure of employee satisfaction, compare different measurement scales that may include job description methods and job satisfaction scales, and then select the one suitable for the subjects under study.

5.5.2 Limitations of sample collection

Although the study has taken into account pharmaceutical distribution enterprises of different scales, revenue sizes, and development stages, the questionnaire was only administered to Meheco Guangdong and its subsidiaries, rather than to companies in different regions and of different sectors in China. As the sample collection is limited, the data only reflect the situation of the specific pharmaceutical distribution company studied and cannot be generalized. However, being one of the four large drug distributing companies in China, that operate under similar institutional conditions, this case may still be considered of relevance to other companies in the same or even in other sectors.

Future research can expand the sample size and coverage to other regions in China, to verify the theoretical model and research hypotheses and have a deeper exploration of the moderating role of organizational culture.

5.5.3 Conclusion

The research concluded that it is adaptability and mission – two of the four traits of organizational culture considered – that moderate the relationship between Confucian traditional values at workplace and employee satisfaction. This conclusion was reported to the target company, and it may be of interest for research to follow up whether and how the company will implement the suggestions provided and what the outcome will be.

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- The General Office of the State Council of the People's Republic of China. (2016). *Notice of General Office of the State Council on the issuance of the key work tasks of deepening the reform of the medical and health system in 2016* (Report No. 26).
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Annex

Questionnaire

Dear Sir/Madam:

Thank you for taking your time to fill out this questionnaire. The questionnaire is designed to understand the organizational culture and organizational performance. Collected in an anonymous way, your answers will be strictly confidential and only used for the purpose of academic research. There is no right or wrong answer. We appreciate your true and honest answer. Please tick "✓" or fill in the number in the box that you think is appropriate.

Thank you for your support of this research!

Part 1: Basic personal information

Please fill in your basic personal information which will be used for academic research only.

1. Gender : (1) Male ☐ (2) Female ☐
2. Age: (1) <20 ☐ (2) 20-29 ☐ (3) 30-39 ☐ (4) 40-49 ☐ (5) >50 ☐
3. Education level : (1) high school and below ☐ (2) Associate Bachelor ☐ (3) Bachelor ☐ (4) Master ☐ (5) Doctor ☐
4. Years of Working: year(s)
5. Your employer: (1) China Meheco Guangdong Pharmaceutical Co., Ltd. ☐ (2) Meheco Pharmaceutical (Jiangmen) Co., Ltd. ☐ (3) Meheco Pharmaceutical (Huizhou) Co., Ltd. ☐ (4) Meheco Foshan Pharmaceutical Co., Ltd. ☐ (5) Meheco Zhanjiang Wanbang Pharmaceutical Co., Ltd. ☐ (6) Meheco Pharmaceutical (Shenzhen) Co., Ltd. ☐ (7) Meheco Pharmaceutical (Dongguan) Co., Ltd. ☐ (8) Meheco Pharmaceutical (East Guangdong) Co., Ltd. ☐
6. Years of working for the current employer: year(s)
7. Job category: (1) Marketing ☐ (2) Procurement ☐ (3) Finance ☐ (4) Logistics ☐ (5) Operation, Administration, QA ☐ (6) Other ☐
8. Position level: (1) Junior Management ☐ (2) Middle Management ☐ (3) Senior Management ☐ (4) Non-management ☐

Part II: Organizational Culture

Please rate the degree of agreement for each item according to your feelings about the organizational culture of your company. The scores are represented by 1 to 5. 1= strongly disagree, 2=disagree, 3= not

sure, 4=agree, 5=strongly agree. Please tick “√” in the corresponding box.

Item	strongly disagree	disagree	Not sure	Agree	Strongly agree
1. Most employees are highly involved in their work.	1 ☐	2 ☐	3 ☐	4 ☐	5 ☐
2. Decisions are usually made at the level where the best information is available.	1 ☐	2 ☐	3 ☐	4 ☐	5 ☐
3. Information is widely shared so that everyone can get the information he or she needs when it's needed.	1 ☐	2 ☐	3 ☐	4 ☐	5 ☐
4. Everyone believes that he or she can have a positive impact.	1 ☐	2 ☐	3 ☐	4 ☐	5 ☐
5. Business planning is ongoing and involves everyone in the process to some degree.	1 ☐	2 ☐	3 ☐	4 ☐	5 ☐
6. Cooperation across different parts of the organization is actively encouraged.	1 ☐	2 ☐	3 ☐	4 ☐	5 ☐
7. People work like they are part of a team.	1 ☐	2 ☐	3 ☐	4 ☐	5 ☐
8. Teamwork is used to get work done, rather than hierarchy.	1 ☐	2 ☐	3 ☐	4 ☐	5 ☐
9. Teams are our primary building blocks.	1 ☐	2 ☐	3 ☐	4 ☐	5 ☐
10. Work is organized so that each person can see the relationship between his or her job and the goals of the organization.	1 ☐	2 ☐	3 ☐	4 ☐	5 ☐
11. Authority is delegated so that people can act on their own.	1 ☐	2 ☐	3 ☐	4 ☐	5 ☐
12. The “bench strength” (capability of people) is constantly improving.	1 ☐	2 ☐	3 ☐	4 ☐	5 ☐
13. There is continuous investment in the skills of employees.	1 ☐	2 ☐	3 ☐	4 ☐	5 ☐
14. The capabilities of people are viewed as an important source of competitive advantage.	1 ☐	2 ☐	3 ☐	4 ☐	5 ☐
15. Problems often arise because we do not have the skills necessary to do the job.	1 ☐	2 ☐	3 ☐	4 ☐	5 ☐
16. The leaders and managers “practice what they preach”.	1 ☐	2 ☐	3 ☐	4 ☐	5 ☐
17. There is a characteristic management style and a distinct set of management practices.	1 ☐	2 ☐	3 ☐	4 ☐	5 ☐

18. There is a clear and consistent set of values that governs the way we do business.	1 ☐	2 ☐	3 ☐	4 ☐	5 ☐
19. Ignoring core values will get you in trouble.	1 ☐	2 ☐	3 ☐	4 ☐	5 ☐
20. There is an ethical code that guides our behavior and tells us right from wrong.	1 ☐	2 ☐	3 ☐	4 ☐	5 ☐
21. When disagreements occur, we work hard to achieve "win-win" solutions.	1 ☐	2 ☐	3 ☐	4 ☐	5 ☐
22. There is a "strong" culture.	1 ☐	2 ☐	3 ☐	4 ☐	5 ☐
23. It is easy to reach consensus, even on difficult issues.	1 ☐	2 ☐	3 ☐	4 ☐	5 ☐
24. We often have trouble reaching agreement on key issues.	1 ☐	2 ☐	3 ☐	4 ☐	5 ☐
25. There is a clear agreement about the right way and the wrong way to do things.	1 ☐	2 ☐	3 ☐	4 ☐	5 ☐
26. Our approach to doing business is very consistent and predictable.	1 ☐	2 ☐	3 ☐	4 ☐	5 ☐
27. People from different parts of the organization share a common perspective.	1 ☐	2 ☐	3 ☐	4 ☐	5 ☐
28. It is easy to coordinate projects across different parts of the organization.	1 ☐	2 ☐	3 ☐	4 ☐	5 ☐
29. Working with someone from another part of this organization is like working with someone from a different organization.	1 ☐	2 ☐	3 ☐	4 ☐	5 ☐
30. There is good alignment of goals across levels.	1 ☐	2 ☐	3 ☐	4 ☐	5 ☐
31. The way things are done is very flexible and easy to change.	1 ☐	2 ☐	3 ☐	4 ☐	5 ☐
32. We respond well to competitors and other changes in the business environment.	1 ☐	2 ☐	3 ☐	4 ☐	5 ☐
33. New and improved ways to do work are continually adopted.	1 ☐	2 ☐	3 ☐	4 ☐	5 ☐
34. Attempts to create change usually meet with resistance.	1 ☐	2 ☐	3 ☐	4 ☐	5 ☐
35. Different parts of the organization often cooperate to create change.	1 ☐	2 ☐	3 ☐	4 ☐	5 ☐

36. Customer comments and recommendations often lead to changes.	1 ☐	2 ☐	3 ☐	4 ☐	5 ☐
37. Customer input directly influences our decisions.	1 ☐	2 ☐	3 ☐	4 ☐	5 ☐
38. All members have a deep understanding of customer wants and needs.	1 ☐	2 ☐	3 ☐	4 ☐	5 ☐
39. The interests of the customer often get ignored in our decisions.	1 ☐	2 ☐	3 ☐	4 ☐	5 ☐
40. We encourage direct contact with customers by our people.	1 ☐	2 ☐	3 ☐	4 ☐	5 ☐
41. We view failure as an opportunity for learning and improvement.	1 ☐	2 ☐	3 ☐	4 ☐	5 ☐
42. Innovation and risk taking are encouraged and rewarded.	1 ☐	2 ☐	3 ☐	4 ☐	5 ☐
43. Lots of things “fall between the cracks”.	1 ☐	2 ☐	3 ☐	4 ☐	5 ☐
44. Learning is an important objective in our day-to-day work.	1 ☐	2 ☐	3 ☐	4 ☐	5 ☐
45. We make certain that the “right hand knows what the left hand is doing”.	1 ☐	2 ☐	3 ☐	4 ☐	5 ☐
46. There is a long-term purpose and direction.	1 ☐	2 ☐	3 ☐	4 ☐	5 ☐
47. Our strategy leads other organizations to change the way they compete in the industry.	1 ☐	2 ☐	3 ☐	4 ☐	5 ☐
48. There is a clear mission that gives meaning and direction to our work.	1 ☐	2 ☐	3 ☐	4 ☐	5 ☐
49. There is a clear strategy for the future.	1 ☐	2 ☐	3 ☐	4 ☐	5 ☐
50. Our strategic direction is unclear to me	1 ☐	2 ☐	3 ☐	4 ☐	5 ☐
51. There is widespread agreement about goals.	1 ☐	2 ☐	3 ☐	4 ☐	5 ☐
52. Leaders set goals that are ambitious, but realistic.	1 ☐	2 ☐	3 ☐	4 ☐	5 ☐
53. The leadership has “gone on record” about the objectives we are trying to meet.	1 ☐	2 ☐	3 ☐	4 ☐	5 ☐
54. We continuously track our progress against our stated goals.	1 ☐	2 ☐	3 ☐	4 ☐	5 ☐
55. People understand what needs to be done for us to succeed in the long run.	1 ☐	2 ☐	3 ☐	4 ☐	5 ☐

56. We have a shared vision of what the organization will be like in the future	1 ☐	2 ☐	3 ☐	4 ☐	5 ☐
57. Leaders have a long-term viewpoint.	1 ☐	2 ☐	3 ☐	4 ☐	5 ☐
58. Short-term thinking often compromises our long-term vision.	1 ☐	2 ☐	3 ☐	4 ☐	5 ☐
59. Our vision creates excitement and motivation for our employees.	1 ☐	2 ☐	3 ☐	4 ☐	5 ☐
60. We are able to meet short-term demands without compromising our long-term vision.	1 ☐	2 ☐	3 ☐	4 ☐	5 ☐

Part III: Values at workplace

Please rate the degree of agreement for each item according to your feelings about your company. The scores are represented by 1 to 5. 1= strongly disagree, 2=disagree, 3= not sure, 4=agree, 5=strongly agree. Please tick “√” in the corresponding box.

Item	strongly disagree	disagree	Not sure	Agree	Strongly agree
1. The leader is like a patriarch, who is supposed to make decisions for major affairs of the organization.	1 ☐	2 ☐	3 ☐	4 ☐	5 ☐
2. One of the best ways to avoid mistakes is to follow the advice of the elders	1 ☐	2 ☐	3 ☐	4 ☐	5 ☐
3. In the case of a dispute that cannot be resolved, the colleague with the highest seniority should be the one to judge.	1 ☐	2 ☐	3 ☐	4 ☐	5 ☐
4. Respect for and obedience to leadership are considered as virtues.	1 ☐	2 ☐	3 ☐	4 ☐	5 ☐
5. Even if it is someone else's fault, we should try our best to tolerate and forgive.	1 ☐	2 ☐	3 ☐	4 ☐	5 ☐
6. I will avoid causing trouble to others even if it causes inconvenience to myself.	1 ☐	2 ☐	3 ☐	4 ☐	5 ☐
7. I am always responsive to the requests of my department and organization.	1 ☐	2 ☐	3 ☐	4 ☐	5 ☐
8. It's always good to help others even though it does not bring me personal gains.	1 ☐	2 ☐	3 ☐	4 ☐	5 ☐
9. Personal interests should be subordinate to the interests of the department and organization.	1 ☐	2 ☐	3 ☐	4 ☐	5 ☐
10. Even if the leader's request is inappropriate, the employees should follow.	1 ☐	2 ☐	3 ☐	4 ☐	5 ☐
11. Even if the organization is wrong, employees should obey.	1 ☐	2 ☐	3 ☐	4 ☐	5 ☐
12. Work remuneration should first be based on seniority, then on personal competence.	1 ☐	2 ☐	3 ☐	4 ☐	5 ☐
13. Employees should just follow the company's rules and regulations. There is no need to understand the rationale behind them.	1 ☐	2 ☐	3 ☐	4 ☐	5 ☐
14. Mistakes should be discussed privately, while strength should be commended publicly.	1 ☐	2 ☐	3 ☐	4 ☐	5 ☐

15. As long as it doesn't lose face, there is nothing to lose.	1 ☐	2 ☐	3 ☐	4 ☐	5 ☐
16. Even if I have a conflict of interest with my colleagues, I will not easily fall out with them.	1 ☐	2 ☐	3 ☐	4 ☐	5 ☐

Part IV: Organizational performance

The following indicators are used to measure the organizational performance of your company. Please rate the indicators based on your understanding. The scores are represented by 1 to 5, indicating your company's organizational performance from low to high relative to similar companies. "0" means it is difficult to answer. Please tick "✓" in the corresponding box.

indicator	low—————high—————					Not sure
Compared with similar companies, your company's average revenue growth rate is	1 ☐	2 ☐	3 ☐	4 ☐	5 ☐	0 ☐
Compared with similar companies, your company's average profit is	1 ☐	2 ☐	3 ☐	4 ☐	5 ☐	0 ☐
Compared with similar companies, your company's average return on investment is	1 ☐	2 ☐	3 ☐	4 ☐	5 ☐	0 ☐
Compared with similar companies, your company's average market share is	1 ☐	2 ☐	3 ☐	4 ☐	5 ☐	0 ☐
Compared with similar companies, your company's employee satisfaction level is	1 ☐	2 ☐	3 ☐	4 ☐	5 ☐	0 ☐
Compared with similar companies, your company's customer satisfaction level is	1 ☐	2 ☐	3 ☐	4 ☐	5 ☐	0 ☐
Compared with similar companies, your company's employee turnover rate is	1 ☐	2 ☐	3 ☐	4 ☐	5 ☐	0 ☐
Compared with similar companies, your company's product and service quality is	1 ☐	2 ☐	3 ☐	4 ☐	5 ☐	0 ☐
Compared with similar companies, your company's innovation level is	1 ☐	2 ☐	3 ☐	4 ☐	5 ☐	0 ☐
Compared with similar companies, your company's breadth of coverage in healthcare industry is	1 ☐	2 ☐	3 ☐	4 ☐	5 ☐	0 ☐
Compared with similar companies, your company's extent of cross-sectoral cooperation is	1 ☐	2 ☐	3 ☐	4 ☐	5 ☐	0 ☐

This is the end of this questionnaire. Thank you again for your time! We wish you every success and all the best!