

**Paternalistic Leadership and Team Performance in China  
Teaching Hospitals: Examining Roles of Team Psychological  
Safety and Team Empowerment**

Yatkeung Chong

Thesis submitted as partial requirement for the conferral of  
Doctor of Management

Supervisor:

Prof. Silvia Silva, Associate Professor, ISCTE University Institute of Lisbon

Co-supervisor:

Prof. Runtian Jing, Professor, University of Electronic Science and Technology  
of China, School of Management and Economics

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## Declaration

I declare that this thesis does not incorporate without acknowledgment any material previously submitted for a degree or diploma in any university and that to the best of my knowledge it does not contain any material previously published or written by another person except where due reference is made in the text.


Signed: 

Date: 2013-07-31

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## **Abstract**

People and hospitals are pressured to improve department performance; leader management is crucial in promoting performance in a fast changing and competitive situation. Department leaders in Chinese teaching hospitals are both academic leaders and tutors of the junior and, therefore, act as father. Such father-like leader is called as paternalistic leadership rooted in Chinese Confucian culture. This research identifies the influencing processes that underlie the effect of the three dimensions of paternalistic leadership (benevolent, moral, authoritarian) on the performance of departments in Chinese teaching hospitals. Based on data collected in 15 teaching hospitals in Guangzhou, Chengdu, Shanghai, and Beijing, the results showed that team psychological safety and team empowerment sequentially mediated the effects of benevolent leadership and moral leadership on team performance. However, it was found that authoritarian leadership had no effect on team psychological safety. Selfless benefactor and authentic PL types, that both are characterized with high benevolence and morality, had the highest scores on team psychological safety and team empowerment. The laissez-faire and dictatorial PL types, that both are characterized with low benevolence and morality, were found in a large proportion of departments and had the lowest scores on team psychological safety, team empowerment, and team performance. The results emphasized the importance of practicing benevolent leadership and moral leadership in Chinese teaching hospitals and future research is needed on paternalistic leadership, team psychological safety, team empowerment and team performance relationship in other contexts. Moreover, it is also important to study other effects and influences of paternalistic leadership dimensionality and authoritarian leadership.

**Key words:** Paternalistic leadership; Team psychological safety; Team empowerment; Team performance

**JEL:** D23; L25.





## Resumo

As pessoas e os hospitais são pressionados para melhorar o desempenho dos seus departamentos e a liderança é crucial para promover o desempenho nas situações de mudança rápida e de natureza competitiva. Os líderes dos departamentos nos hospitais universitários chineses são simultaneamente líderes acadêmicos e tutores dos profissionais mais jovens e, portanto, atuam como um pai. Estes líderes semelhantes a um pai são designados como líderes paternalistas, termo que tem a sua raiz na cultura confucionista chinesa. A presente pesquisa identifica os processos de influência que estão subjacentes ao efeito das três dimensões da liderança paternalista (benevolência, moralidade e autoritarismo) sobre o desempenho dos departamentos de hospitais universitários chineses. Os resultados, baseados nos dados recolhidos em 15 hospitais universitários em Guangzhou, Chengdu, Xangai e Pequim, mostraram que a segurança psicológica da equipa e o *empowerment* da equipa medeiam sequencialmente os efeitos da liderança benevolente e da liderança moral no desempenho da equipa. No entanto, a liderança autoritária não teve efeito sobre a segurança psicológica da equipa. Análises adicionais revelaram que tipos de liderança paternalista correspondentes a líderes benfeitores altruístas e autênticos, ambos caracterizados por alta benevolência e moralidade, obtiveram as pontuações mais altas na segurança psicológica da equipa. Verificou-se ainda que os tipos de liderança paternalista caracterizados por *laissez-faire* e ditatoriais, ambos caracterizados por baixa benevolência e moralidade, que existiam numa grande proporção dos departamentos, obtiveram as pontuações mais baixas na segurança psicológica da equipa, no *empowerment* da equipa e no desempenho da equipa. Os resultados enfatizam a importância da liderança benevolente e da liderança moral nos hospitais universitários chineses e revelam que estudos futuros devem focar a relação entre a liderança paternalista, a segurança psicológica da equipa, o *empowerment* da equipa e o desempenho da equipa noutros contextos. No futuro é ainda importante continuar a estudar outros efeitos e influências associados às dimensões da liderança paternalista e à liderança autoritária.

**Palavras-chave:** Liderança paternalista; Segurança psicológica da equipa; *Empowerment* da Equipa, Desempenho da Equipa

**JEL:** D23; L25.



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## **Chapter I: Introduction**

### **1.1 Context of the study and statement of the problem**

Nowadays, hospitals are facing many challenges brought about by issues such as technological innovation, staff movement, economic fluctuation, and new quality and regulatory mandates. The current situation of health transformation especially to that was performed in hospitals in China emphasized the studies on hospital performance which is one of the core components in hospital accreditation. Hospital accreditation is conducted by government and critical to determine the future rank and operation of hospitals. This is especially salient to China teaching hospitals since almost all of them represent the best medical technical level in local even the whole country. Hence, it's necessitating to focus on hospital performance and clarify what attributes to it in Chinese culture context.

Leader's management style is crucial in creating best performance. The behaviors that directly influence members' perceptions are generally not those of the organizations' chief executive or senior managers but are instead those of team leaders, middle managers, and front line supervisors, who interact face to face with team members (Edmondson, 2004). Furthermore, department performances in hospital are the basis of hospital performance. Therefore, in this study, we focus on leader management style and performance on department level in China teaching hospital setting.

There is no doubt that leaders' behaviors have great impact on performance. It's noteworthy that for most of western teaching hospitals, there is a rule that they tend to employ healthcare workers who are not graduated from their own hospitals, which would be helpful in improving the quality of health service and management level. This is because it provides an opportunity for communication among employees with different educational backgrounds. However, in China, it's completely different, healthcare workers especially physicians usually join into the teaching hospitals after graduation they studied in. The senior physicians begin to cultivate the junior who will follow them in the future since they are still interns in hospitals, such way of cultivation can be described as "inbreeding". This generates an institute analogous to a family. Furthermore, in most of western countries the administrators are from

various backgrounds such as business and public administration, and perform administrative tasks and activities only. However, China hospital administrators are generally promoted from the academic excellent. Hence, China teaching hospital leaders especially department leaders are usually also academic leaders and tutors of the junior. The dual role of department leaders in China hospital allows them to have more strength over their authority. Considering the cultivation method as well, department leaders in China teaching hospital may act like fathers in departments. This father-like leader is termed as paternalistic leader. However, previous studies on paternalistic leadership are more based on schools, armies, firms; no study has been found conducted in hospitals. Secondly, most of previous writings on China hospital leadership focused on borrowing and testing western leadership concepts and theories such as transformational leadership among small nurses group or other healthcare worker group, seldom researcher focused on emic study of Chinese leadership in hospitals. Thirdly, the majority of previous studies on paternalistic leadership focused on linking this distinct leadership to employee attitudes, e.g. satisfaction, commitment and loyalty, a few studies identified links between paternalistic leadership and employee performance either relied on self-reported performance, or focused on organizational citizenship behaviors as set of discretionary behaviors outside of job description (Organ, 1988). No study has been found to explore the mechanism underlying the relationship between paternalistic leadership and team performance which refers as department level performance in hospital settings.

In the present research we proposed that safety especially team psychological safety and team empowerment, play important roles in linking China teaching hospital paternalistic leadership to department/team performance. Psychological safety is often conceptualized as critical mediating mechanism between leaders and subordinates in individual level. It is expected that the accordingly team level variable team psychological safety (Edmondson, 1999a) which refers to shared belief that the team will not embarrass, reject, or punish someone for speaking up, also plays an important role in such link at team level. Team empowerment is another psychological response of subordinates that can be defined as increased task motivation that is due to team members' collective, positive assessments of their organizational tasks (Kirkman & Rosen, 2000). Scholars have evidences of team empowerment's effects on task performance.

It's notable that the characteristics of medical science and China hospitals require higher team empowerment and team psychological safety than other institutions.

In China teaching hospitals, physicians are facing with competitive demands for lower cost with higher performance, and stressors of an increasingly regulated environment, complex health care equipment, and demands for higher standards of medical care, better patient-provider interactions, and quicker response times. To promote department performance in current situation, physicians need to be motivated in handling with changes immediately, to enhance their medical ethics and inner perception of the meaning and significance of their work, and control over difficulties. Medical science is an empirical science; improvement in technology and medical skills relies on learning and improvement from the past errors. The way to promote department performance can be learn from the past errors, which demonstrates the significance of increasing physicians' motivation in learning to increase department performance. In addition, many emergent situations happening in hospitals, physicians need to take action immediately without permission from the department leaders to save lives of patients. In such cases, only when physicians perceive that they have decision-making rights and it is their responsibility to participate in this rescue, they are likely to participate. All such cases indicate the needs to increase physicians' task motivation. However, healthcare professionals often perceive they have little or no control over extensive changes and stressors in hospital industry (Koberg, Boss, Senjem, & Goodman, 1999). Furthermore, the increasing turnover rate reveals the physicians' loss of confidence of in this industry. Therefore, we propose that if physicians perceive task motivation and be confident of their department work, they are likely to change and handle with changes and learning to promote department performance. Such collective shared belief can be summarized as a climate for empowerment. Previous study on empowerment conducted in hospitals focused on antecedents and outcomes of empowerment on individual level and in Western context, no study has been found in China hospitals, let alone on team level.

All of China teaching hospitals are public institutions that are not-for profit and provide basic medical care service for people. Even though the not-for-profit attribute has not been well performed in recent years due to numbers of factors including policy, economy, human resources, which makes hospital operate like an enterprises; teaching hospitals are different

from enterprises and other institutions in many aspects. Few industries have more at stake when team's learner fails to learn—than health care. This is because the product of hospitals is medical service provided to patients that is closely related to patients' lives. Such phenomenon that physicians are facing with high medical risk is more obvious especially to those teaching hospitals since they are classified into hospitals with the most advanced medical technological skills and be made prepared to treat the most serious patients. Therefore, physicians are encouraged to cooperate with department members or people from other departments in hospitals. This also coincides with values of Chinese collectivism society. The cooperation enhances communication and contact within department members, through which physicians may perceive others' evaluations on their behaviors and interpersonal risks of working in the environment. Only when physicians feel that there is no criticizes and punishments from collaborators particularly department leaders, they perceive safe, which describes a department climate of psychological safety. Only when people are to feel secure, changing of behaviors and speaking up freely (Schein & Bennis, 1965).

Based on description above, in China teaching hospitals, team psychological safety and team empowerment play important roles. It is needed to explore how do those team climates facilitate the effects of paternalistic leadership on performance on department level in China teaching hospitals.

## **1.2 Purpose of the study**

The purpose of this study is to investigate the mechanism that how department leader's paternalistic leadership affects department performance in China teaching hospitals through team-level analysis; and effects of paternalistic leadership styles through configurational approach.

## **1.3 Research question sand framework**

China teaching hospitals are different from other enterprises in many aspects. According to Farh and Cheng's paternalistic leadership model, it has effects on employee performance. Is



this leadership also has effects on performance on department level in China teaching hospitals? Team psychological safety and team empowerment play important roles in China teaching hospitals; will the paternalistic leadership affect department performance through team psychological safety and team empowerment? Paternalistic leadership has conflicting components, what are the effects of different types of it. Therefore, the following questions needs to be fixed in this study:

1. How paternalistic leadership on department level in China teaching hospitals affects collective group shared belief of safety and empowerment?
2. If paternalistic leadership on department level has impact on group shared belief of safety ad empowerment, how do they then have effects on department performance in China teaching hospitals?
3. What are the different types of PL leader that exist in China teaching hospitals, and what are their effects on team climate of psychological safety and empowerment and department performance?

#### **1.4 Research methods**

This research used a quantitative approach to study the effects of paternalistic leadership and mediating roles of team psychological safety and team empowerment in China teaching hospitals. All data were collected using questionnaires in teaching hospital department leader sample and physician sample. A department was a research unit.

#### **1.5 Limitations of the study**

The researcher focused on the mechanism that paternalistic leadership has impact on department performance in China teaching hospitals and roles of team psychological safety, team empowerment in such relationship. This study is cross-sectional design. Therefore, the causal ordering may be subject to debate.

Data on leadership, team psychological safety and team performance was collected from physicians, which has a risk of common method variance. In addition, this study was

conducted within China teaching hospitals. The conclusions may not be generalized to other organization or cultural context.

### **1.6 Significance of the study**

By adopting Farh and Cheng's (2000) three-dimension model of paternalistic leadership, we follow the call of Pellegrini and Scandura (2008) and Chen, et al (2011) to shed further light on the impact and interrelations of the three dimension of paternalistic leadership. The dimensional analysis may deepen our outstanding on which dimension is more strongly related to team performance, which Pellegrini and Scandura (2008) particularly urged to do. By exploring the mechanism underlying the effects of paternalistic leadership on team performance, this study establishes theoretical bases in linking these constructs. The configurational approach to study different types of paternalistic leadership which contains conflicting elements would provide a holistic view in examining the effects of this leadership. This research considers the Chinese cultural context and characteristics of hospital setting and medical science when explicating the salient role of team psychological safety and team empowerment in paternalistic leadership. The cultural, organizational, and professional perspectives is still limited but critical in understanding how leadership and team climate evolve with certain value systems (Noorderhaven, 1999).

## **Chapter II: Review of Literature and Hypothesis Development**

### **2.1 Theory of paternalistic leadership**

#### **2.1.1 Description of developing of paternalistic leadership theory and its definition**

Leadership as a social influence process is a universal phenomenon that transcends national borders, but conceptions of it and the styles and practices associated with it have been found to vary widely across cultures. As many authors have noted these cultural differences, instead of transplanting western leadership theory to Chinese context, they have chosen indigenous approach to explore leadership in Chinese organizations. Of those indigenous leadership theories, the one that is well developed, systematically studied style is paternalism or paternalistic leadership (PL) model (Farh & Cheng, 2000; Farh, Cheng, Chou, & Chu, 2006).

The discovery of PL is attributed to the explosion of entrepreneurship among overseas Chinese in East and South-east Asia countries in the second half of twentieth century. This intrigued the scholars to study this distinct leadership that rooted in traditional Chinese family business in which paternalism was widely practiced among the owners/managers (Farh, Liang, Chou, & Cheng, 2008).

In the late 1960s, the developing of Taiwan's economy was observed by many researchers. Silin (1976) was among the first to note the paternalistic management style of overseas Chinese owners. He found that the leadership concept and behavior styles of business owner in those Chinese family businesses were different from those in the West. Silin (1976) summarized these differences via various behaviors based on observation and interviews with chief executive officers in Taiwan private enterprises managed by single individuals. He also comprehensively described the leadership philosophy and behavioral patterns of those owners/managers. Although he did not label them as 'paternalistic' in his work nor evaluate how effective is this leadership style in terms of subordinate satisfaction and performance, it's a huge step in developing the PL theory. In Silin's theory (1976), the distinct leadership styles of the owners/managers could be characterized by moral leadership (acting as a morally superior individual by rejecting egocentric impulse), didactic leadership (conveying to subordinates the methods by which he has achieved business success), centralized authority,

maintaining social distance from subordinates, keeping intentions ill defined (hiding intentions from subordinates to maintain authority and control), and implementing control practices (e.g. adopting divide-and-rule tactics, appointing loyal subordinates to several positions concurrently, rarely expressing confidence in subordinates in public to maintain an imbalance of power).

In the late 1980s, Redding who was also inspired by the remarkable success of overseas Chinese family businesses began to study management practices in such firms in Hong Kong, Singapore, Taiwan and Indonesia. Through in-depth interviews with 72 owner managers, he identified a distinct brand of economic culture that he called Chinese capitalism in which paternalism is a key element. He broke down paternalism into seven themes: 1) dependence of the subordinate as a mind-set; 2) personalized loyalty, leading to subordinates' being willing to conform; 3) authoritarianism modified by sensitivity to subordinates' views; 4) authority not divisible when it has become clearly identified with a person; 5) aloofness and social distancing within the hierarchy; 6) allowance for the leader's intentions to remain loosely formulated; and 7) the leader as exemplar and 'teacher' (Redding, 1990). Even though Redding's description is similar to that of Silin's (1976) in aspects of recognized elements of authoritarian and moral leadership, he made a remarkable progress as the discovery of benevolent component, which he illustrated as "fatherly concern or considerateness for subordinates" and "sensitivity to subordinate views". This benevolence was not apparent in Silin's description of Taiwanese leadership. However, Redding didn't answered the issue how effective is this style of leadership in terms of subordinate satisfaction and performance clearly either.

Following the work of Silin (1976) and Redding (1990), Westwood (1997) put forward a "paternalistic headship" model for this distinct Chinese family business leadership and described nine stylistic elements: didactic leadership, non-specific intentions, reputation building, protection of dominance, political manipulation, patronage and nepotism, conflict diffusion, aloofness and social distance, and dialogue ideal, which exist in the general structural characteristic of centralization, low formalization, harmony-building, and personalism. As Silin and Redding did before, Westwood didn't answer the same question stated above.

At the same period, Cheng (1995a, 1995b, 1995c) conducted a comprehensive study in Taiwan. Building on extensive review of related literatures and a series of case studies, in-depth interview, and quantitative data, Farh and Cheng (Farh & Cheng, 2000) defined PL as a type of leadership that combines strong and clear authority with concern, considerateness, and elements of moral leadership couched in personality atmosphere. Based on this definition, PL consists of three important elements: authoritarianism, benevolence, and moral leadership. Authoritarianism means a leader's behavior of asserting strong authority and control over subordinates and demanding unquestioned obedience from subordinates. Benevolence refers to a leader's behavior of demonstrating individualized, holistic concern for subordinates' personal or familial well-being. Moral leadership is broadly illustrated as a leader's behavior that demonstrates superior personal virtues, self-discipline, and unselfishness (Farh & Cheng, 2000). The left part of Figure 1 summarizes leader behaviors under each of the three key elements of PL. Farh and Cheng's model is the most popular one discussed and studied around the world.

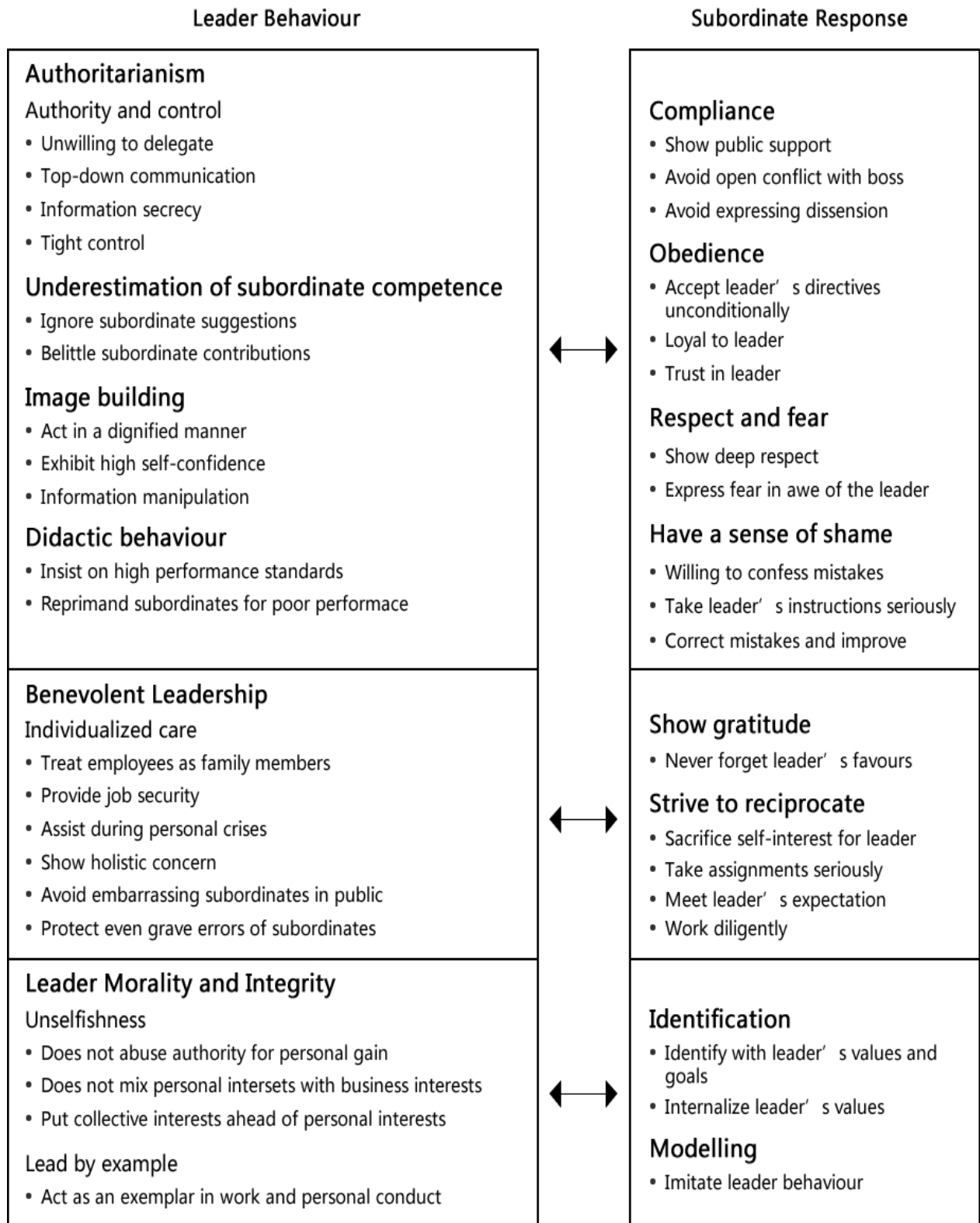


Figure 1. Paternalistic leader behavior and subordinate response (Farh & Cheng, 2000, p98)

### 2.1.2 Description of cultural origins of PL

Farh and Cheng (2000) also contributed a great deal in explaining the social and cultural roots

of PL based on the work of Silin (1976) and Redding (1990), Westwood (1997). Authoritarian leadership could be traced from the cultural traditions of Confucianism and Legalism in which on one hand the father-son relationship is considered paramount and supersedes all other social relations and the father has legitimate authority over his son as well as other family members, on the other hand, the Legalist doctrine called for the emperor to distrust his ministers and maintain absolute power and control over them through political manipulation. Those two traditions lead to Political Confucianism prevalent in Chinese society in which a superior acts as a father and has the right to maintain strong authority over subordinate who acts as a son and in return the subordinate is obligated to obey.

Benevolent leadership originates from Confucian ideal of the five cardinal mutuality relationships and the norm of reciprocity (*bao*) in social relations. The five relationship includes a benevolent ruler with his loyal minister, a kind father with his filial son, a righteous husband with his submissive wife, a kind elder with the deferent junior and friend with friend that were maintained by each party performed his/her role dutifully. The reciprocity refers that benevolence on the part of superior generates indebtedness on the part of the inferiors who try to reciprocate earnestly and was driven by genuine gratitude, personal loyalty, or obedience to and compliance with the superior's requests, even beyond what's normally required by the subordinate role (Yang, 1957). Accordingly, when generalized to workplace, this entails protection of the follower by the leader and loyalty toward the leader by the follower.

In addition, moral leadership also terms from Confucianism which believes that both in the realm of family and in government, the use of moral principles or examples should be highlighted and Chinese has a long history of evaluating leaders on moral grounds. Furthermore, the moral leadership is expected by subordinate for their well-being against potential abuse of authority by the superior especially in a system ruled by people than by laws and regulations in which the government guarantees less protection of people's right and the virtue.

### **2.1.3 Description of subordinate responses of PL**

In Farh and Cheng's model, they further answered the question above in terms of the dynamics between PL and subordinate's response as shown in Figure 2. As they analyzed,

each leadership dimension is hypothesized to be matched with distinct subordinate role responses and corresponding behaviors (Farh & Cheng, 2000). The leader's authoritarian behavior is expected to evoke dependence and compliance of subordinates, while the leader's benevolence is expected to be met by the subordinate's gratitude and obligation to pay back; the leader's morality is expected to lead to the subordinate's respect for and identification with the leader. Figure 1 also lists subordinate's psychological responses under each leadership dimension.

These subordinate psychological responses are presumed to be rooted in traditional Chinese culture, which emphasizes dependence on and submission to authority on the part of the follower in a hierarchical relationship, obligations to repay favors given by others, and the importance of accepting moral teachings.

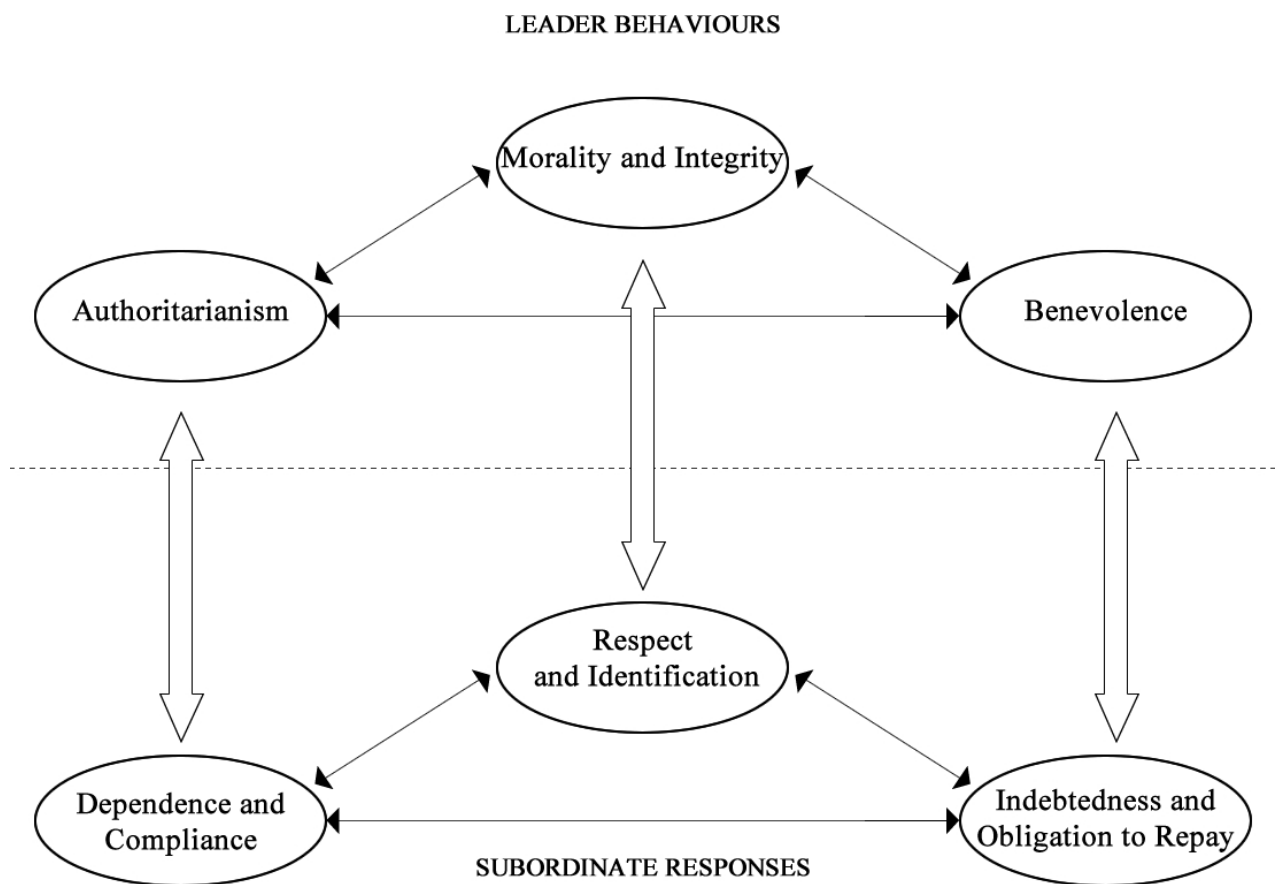


Figure 2. Farh and Cheng's model of paternalistic leadership (Farh & Cheng, 2000, p120)



#### **2.1.4 Effects of paternalistic leadership at individual, team, and organizational level**

The effects of benevolent leadership and moral leadership on individual behavior and psychological response were similar in previous studies that they both have positive relationship on employee's job attitude (organizational commitment, job satisfaction, intention to stay) and work behavior (organizational citizen behavior, in-role performance) (Li, Sun, & Jiao, 2013). However, authoritarian leadership is negatively related to most of independent variable (organizational commitment, job satisfaction, intention to stay, organizational justice) (Chen & Farh, 2010; Farh et al., 2006; 郑伯坝, 谢佩鸳, & 周丽芳, 2002; 周浩 & 龙立荣, 2007, 2008) and positively related to compliance and obedience (Cheng, Chou, Huang, Farh, & Peng, 2003; Cheng, Chou, Wu, Huang, & Farh, 2004). The difference in effects of three dimension of paternalistic leadership may be due to different psychological mechanism or the same mediator underlined the relationship between three dimensions and independent variables, which has not been fully confirmed (Li et al., 2013). Since each of the three dimensions of paternalistic leadership captures a key aspect of PL, there were studies to examine whether they mutually reinforce each other. As Farh and Cheng (2000) pointed, high authoritarianism in conjunction with high benevolence represents an ideal type of leadership widely accepted in traditional Chinese culture. Given the significance of moral leadership in Chinese culture, it is conceivable that the leader's morality may further reinforce the effects of high authoritarianism-high benevolence leadership to produce a highly effective leader (Farh et al., 2008). None study has been conducted to find the three-way interaction between the three dimensions of PL, the two-way interaction has been explored, such as the interaction between authoritarianism and benevolence was sometimes observed in attitudinal outcomes. Cheng, Huang, and Chou (2002) found a significant positive interaction of authoritarianism and benevolence on satisfaction with the leader in work teams. Similar interactions were for identification, compliance, and repayment and gratitude in Cheng et al.'s study (2004). Furthermore, a negative interaction between morality and authoritarianism on attitudinal outcomes was sometimes observed (Cheng et al., 2003; Cheng et al., 2004), which is difficult to interpret. In sum, there is limited evidence on the interactive effects of the three dimensions of PL on subordinate's outcomes, and all existing evidence has not been found reliably across studies (Farh et al., 2006).

Team-level study was focused on the influence of paternalistic leadership on team effectiveness. The majority of research results indicated that benevolent leadership and moral leadership have positive relationship with team effectiveness, while authoritarian leadership has negative effects (陈璐, 井润田, & 杨百寅, 2010; 陈璐, 杨百寅, 井润田, & 王国锋, 2010; 逢晓霞, 邹国庆, & 宋方熠, 2012). The mediating mechanism on team level included conflict management, types of conflict (陈璐, 杨百寅, et al., 2010), and interpersonal trust (陈璐, 井润田, et al., 2010).

On organizational level, not a lot of studies on effects of paternalistic leadership has been conducted. Ju and Wan (2008) found significant effects of paternalistic leadership on enterprise performance after eliminating authoritarian leadership dimension in private enterprise through employees' affection trust and job satisfaction. Yu, Zheng and Li (2009) found the three dimension of PL were positively related to organizational learning.

It's noteworthy that empirical research on PL following Farh and Cheng (2000) has taken an individual method more that focused on the impact of leaders (particular lower-level managers) on their subordinates. This is different from Silin, Redding and Westwood's approach which typically focused on the paternalistic management style of top leaders and their effects on the entire organization.

Farh et al. (2008) outlined a multilevel model of PL in a review that the influence of the overall management style and practices used by top manager and the top management team flow to the lower-level managers. High-level managers are natural role model to lower-level managers due to their ability of control to resources in high position. Furthermore, Farh & Cheng (2000) also proposed that the upper-level management style can affect the effects of lower-level leadership on individual outcome through organizational paternalistic climate.

Overall, PL studies on team level, organization level, and multiple level have not been well developed and future researches are encouraged.

### **2.1.5 Comparison with transformational leadership**

While paternalistic leadership shares conceptual elements with other elemental leadership theories, such as transformational leadership, it is theoretically and empirically distinct. On one hand, both paternalistic leadership and transformational leadership induce emotional

responses of subordinates; however, the psychological responses are different in some aspects. Firstly, transformational management induces subordinate's emotion as optimism, excitement, or stimulation, while emotions induced by paternalistic management style are often related to admiration, respect, liking, gratitude, or fear. Secondly, subordinates' emotions introduced by transformational leaders directed toward both the leader and the organization as a whole, whereas emotions introduced by paternalistic leaders tend to remain at the interpersonal level which means directed toward the leader who exercise paternalistic leader instead of the entire organization (Chen et al., 2011). Thirdly, transformational leaders rely more heavily on the outward expression of intense positive emotions and benefit from being emotionally expressive, an idea that has not been advanced in the paternalistic leadership literature (Ashkanasy & Tse, 2000; Bono & Ilies, 2006).

On the other hand, a critical distinction between paternalistic and transformational leadership is the extent to which leaders are concerned about the subordinate's personal welfare. Transformational leaders provide individualized care that is primarily limited to the work context. Paternalistic leaders, however, provide individualized care in subordinate's work as well as personal lives. They act like parents and ensure that the whole person is being attended to. This difference can be attributed to different cultures. In Western-oriented cultures, subordinates would perceive their leaders' involvement in their personal lives as a violation of privacy; work and home are often clearly distinguished (Chua, Ingram, & Morris, 2008).

One study has showed that PL has extra power in explaining subordinate reactions after controlling for corresponding Western concepts of transformational leadership (Cheng et al., 2004). This finding suggests that PL is, indeed, different from Western leadership and manifests some indigenous characteristics.

Researchers also compared the effects of paternalistic leadership with transformational leadership and found transformational leadership is more effective in organizational performance, subordinates' trust and job satisfaction; however, paternalistic leadership obtain more strength in explaining China loyalty and satisfaction to superior. They are the same effective on Western loyalty (Cheng et al., 2003). In sum, there is no conclusion which leadership is more effective overall.

### 2.1.6 Description of generalizability of PL

Existing research suggests that Farh and Cheng's (2000) model of PL is prevalent in various organizations in Chinese context, which refers that it was not just conducted on simple family-owned firms, but also on the basis of diverse samples such as high-tech companies, schools and armies. Furthermore, some studies revealed that the PL model could transcend Chinese cultural contexts and generalize to Asian contexts that were argued to own the characteristics of paternalism, such as Japan, Korea (Redding, Norman, & Schlender, 1994), India (Sinha, 1990), Turkey (Aycan, 2006), Pakistan (Aycan et al., 2000). Studies conducted in Mexican employees suggested they have very high paternalistic values; this may be because paternalism fits the Mexican cultural values of respect for hierarchical relations and strong family and personal relationships (Morris & Pavett, 1992). In addition, the legal structure also has impact on paternalistic practices in Mexico. Research from Turkey suggests that paternalistic leadership may be an effective management tool in the Middle Eastern business context (Pellegrini & Scandura, 2006), since the traditional Turkish business context reflects high power distance and collectivistic values (Hofstede, 2001; House, Hanges, Javidan, Dorfman, & Gupta, 2004) which makes paternalistic leadership a viable management strategy. In fact, collectivists place a premium on maintaining relationships and place more emphasis on obligation and loyalty (Sullivan, Mitchell, & Uhi-Bien, 2003). The "obligation and loyalty" in personal exchange relationships fits well with the dynamics of paternalistic relationships; and personal relationships are highly valued, and employees expected frequent contact (Hofstede, 2001)

It's noteworthy that in addition to evidence from Latin America, the Middle East, and Pacific Asia regarding the effectiveness of paternalistic leadership, PL is also effective on subordinate's outcomes in some Western countries (Pellegrini, Scandura, & Jayaraman, 2010), such as North America business context. In fact, evidence from this research in United States suggests that authoritarian leadership may produce member satisfaction in large, task-oriented groups (Stogdill, 1974). Aycan et al. (2000) found that American employees reported higher paternalistic values compared with employees from Canada, Germany, and Israel. Furthermore, an empirical study showed that paternalistic treatment to significantly and

positively influence employees' organizational commitment in the North American context (Pellegrini et al., 2010). Ansari et al. (Ansari, Ahmad, & Aafaqi, 2004) argued that the crux of the issue is not the match between style and geographic location. Rather, the answer lies in the fit between the style of a leader and that of his or her followers, and it may be that in the United States, subordinates with certain values, such as a high need for affiliation or high respect for authority, may desire paternalism and be more productive under paternalistic leadership.

In sum, those suggest that PL may generalize across organizations and cultures, which emphasis the importance of studying this distinct leadership.

### **2.1.7 A configurational approach to paternalistic leadership**

Most leadership theorists took a reductionistic approach to examining the leadership phenomenon (Meyer, Tsui, & Hinnings, 1993). They presume that the relationship between leadership and outcomes are deterministic and emphasized on a limited number of variables. An approach would be to treat leadership as a multidimensional phenomenon and analyze leaders' relations to their contexts and outcomes as configurational problems (Meyer et al., 1993). As discussed above, paternalistic leadership is a complex concept embracing conflicting elements (e.g. domineering coupled with individualized care), and working on outcomes through divergent psychological mechanism, particularly authority seems do not affect team empowerment through team psychological safety. This complexity calls for a holistic approach to studying paternalistic leadership.

According to Meyer, Tsui, and Hinnings (1993), configuration means any multidimensional constellation of conceptually distinct characteristics that commonly occur together. Configurations can be represented in typologies developed conceptually from theories or captured in taxonomies through empirical research. Configuration has occasionally been used in previous leadership study. For example, Smith and Foti (1998) analyzed leader emergence from a configurational point of view. They measured leaders with three dispositional variables (dominance, self-efficacy, and intelligence) and then used a median split to obtain eight multivariable patterns to explain the emergence of leaders. Lord and Maher (Lord & Maher, 1991) suggested that followers tend to classify leadership perceptions in different cognitive

categories, and they communicate information about their leadership perceptions through those shared names (category labels). Thus, a typology of PL leaders, together with some revision of the conceptual dimensions, seems to be useful for stimulating future research.

Farh et al. followed earlier researchers and conducted a configurational approach to paternalistic leadership (Farh et al., 2008). Farh et al. dichotomized the three dimensions of paternalistic leadership based on absolute values (High versus Low) on each dimension, and derived eight types of PL. As mentioned, they used capital letter “A” to represent high authoritarianism, lower-case letter “a” for low authoritarianism; “B” for high benevolent leadership, “b” for low benevolent leadership; “C” for high moral character, and “c” for low moral character. Therefore, the eight types are Authentic PL leader (ABC), Godfather PL leader (ABc), Disciplinarian PL leader (AbC), Dictatorial PL leader (Abc), Selfless benefactor PL leader (aBC), Indulgent PL leader (aBc), Ideological PL leader (abC), and Laissez-faire PL leader (abc). Expected by Farh and Cheng that they think the Selfless benefactor PL leader (aBC) and Authentic PL leader (ABC) would be viewed as more favorable in contemporary China. Furthermore, Authentic PL leader (ABC) fit their definition of PL tightly (Farh & Cheng, 2000), while Laissez-faire PL leader (abc) existed rarely because they will not be able to meet the basic requirements of leadership and included in the eight types classification merely as a residual category for comparison purpose (Farh et al., 2008)

Based on Farh et al.’s classification of PL types (Farh et al., 2008), Niu (2006) conducted a research in 265 employees in various private organizations in Taiwan to find which PL type matches the ideal leadership type as perceived by employees. They found that only four types of leader received a significant number of votes as ideal leaders. The most popular one was Selfless benefactor PL leader (aBC) , followed by Authentic PL leader (ABC), Ideological PL leader (abC), and Disciplinarian PL leader (AbC). The remaining four types, Godfather PL leader (ABc), Dictatorial PL leader (Abc), Indulgent PL leader (aBc), Laissez-faire PL leader (abc) combined received only 2.0% of the votes. Therefore, Niu (2006) concluded that high morality received a significant number of votes.

Farh et al. (2008) reanalyzed the data from two samples reported in Cheng, Chou, and Farh (2000) to examine the actual distribution of leaders across the eight PL types and subordinate responses to each type. They used the mid-point of the absolute scale (3.5) as the cutoff to

determine whether a leader was high or low on each PL dimension. In their study, the distribution of actual leaders in the private conglomerate across the eight PL types was similar to the ideal leader distribution found in Niu's (2006) study. The distribution of actual leaders in the school sample is a little different. To examine the effects of PL types on the followers' satisfaction with, and trust in the leader in both the private firm and school samples, the Selfless benefactor PL leader (aBC) obtained the highest satisfaction and trust, followed by Authentic PL leader (ABC), Ideological PL leader (abC), and Disciplinarian PL leader (AbC).

## **2.2 Description of Team Psychological Safety**

### **2.2.1 Definition of team psychological safety**

Most people in organizations are being evaluated. People with more power or high status makes the threat of evaluation especially salient, but it by no means disappears in the presence of peers and subordinates (Edmondson, 2002). This salience of evaluation in organizations intensifies the problem of image risk that people confront in daily lives (Cremer, Snyder, & Dewitte, 2001; Snyder, 1974; Turnley & Bolino, 2001). Edmondson (2002) identified four specific risks to image that people face at work: being seen as ignorant, incompetent, negative, or disruptive. Furthermore, she used the term psychological safety (1999a, 2002) to capture the degree to which people perceive their work environment as conducive to take these interpersonal risks. It consists of taken-for-granted beliefs about how others will respond when one puts oneself on the line, such as asking a question, seeking feedback, reporting mistake, or proposing a new idea (Edmondson, 2004). Individuals engage in a kind of tacit calculus at micro-behavioral decision points in which they assess the interpersonal risk associated with a given behavior; and in which process, they weight the potential action against the particular interpersonal climate (Edmondson, 2004).

There are similar definitions on individual psychological safety. Schein and Bennis (Schein & Bennis, 1965) proposed that a work environment characterized by psychological safety is necessary for individuals to feel secure and thus capable of changing their behavior. Kahn (1990) described it as "feeling able to show and employ one's self without fear of negative consequences to self-image, status, or career". Furthermore, in Kahn's qualitative study, he

found that psychological safety was the psychological condition that “shapes how people inhabited their role”. May et al.’s empirical research revealed that psychological safety promotes work engagement (May, Gilson, & Harter, 2004). Scheil (1985) argued that psychological safety helps people overcome the defensiveness, or “learning anxiety,” that occurs when people are presented with data that disconfirm their expectations or hopes, which can thwart productive learning behavior. Psychological safety does not imply in a cozy environment in which people are necessarily close friends, nor does it suggests an absence of pressure or problem. Rather, it describes a climate in which the focus can be on productive discussion that enables early prevention of problems and accomplishment of shared goals, because people are less likely to focus on self-protection (Edmondson, 2004). For this reason, researchers (Rappoport, 1997; Swift & Copeland, 1996; Waks, 1988) mentioned that particular attention should be paid to psychological safety in the clinical psychological literature, as it is an important element of the therapeutic context. This would be more salient in Chinese collectivism society where the cooperation is encouraged, thus increases opportunities of discussion and communication.

Edmondson’s (1999a) work has focused specially on the experience of people in organizational work teams and he was the first proposed team psychological safety as a group-level construct that characterizes the team as a unit rather than individual as Kahn did (1990). As Alderfer (1987) and Hackman (1987) defined work teams are groups within the context of a larger organization, with clearly defined membership and shared responsibility for a team product or service. Edmondson posited team psychological safety as a unidimensional construct and defined it as a shared belief that the team is safe for interpersonal risk taking. Consistent with this, people who work closely together, such as members of an intact team would perceive psychological safety be highly similar because team members are subject to the same set of contextual and leadership influences and because these perceptions develop out of salient shared experiences (Edmondson, 1999a). In psychological safe environments, people believe that if they make a mistake others will not penalize or think less of them for it; if they ask for help, information or feedback, others will not resent or look down upon them. This belief fosters the confidence to take risks described above.



In this study, we focus on characteristics and performance of team. Therefore, Edmondson's theory of team psychological safety was used.

### **2.2.2 Psychological safety versus trust**

The concepts of psychological safety and trust have much in common that they both demonstrate psychological states including perception of risk or vulnerability, as well as making choices to minimize negative consequences; they both have potential positive consequences for work groups and organizations. However, psychological safety is different from trust. They are complementary but distinct interpersonal beliefs.

Trust is defined by Mayer et al. (1995) as the willingness of one party to be vulnerable to the actions of another party based on the expectation that the other party will perform a particular action important to the trustee, irrespective of the ability to monitor or control that other party. Similarly, Jones and George (1998) argue that trust is “an expression of confidence between the parties in an exchange of some kind—confidence that they will not be harmed or put at risk by the actions of the other party or confidence that no party to the exchange will exploit the other's vulnerability.” All these researchers maintained that “trust leads to a set of behavioral expectations among people, allowing them to manage the uncertainty or risk associated with their interactions so that they can jointly optimize the gains that will result from cooperative behavior” (Jones & George, 1998).

Based on conceptions, there are three elements of psychological safety are depicted to distinguish it from trust: the object of focus, timeframe, and level of analysis (Edmondson, 2004). For the object of focus, trust is often equated with giving others the benefit of the doubt indicating the emphasis on others' potential actions or trustworthiness; while psychological safety is instead whether others will give you the benefit of the doubt when you have made a mistake or ask for help (Edmondson, 2004). For timeframe (Edmondson, 2004), the tacit calculus inherent in psychological safety considers the very short-term interpersonal consequences on expects from engaging in a specific action, which means that people temporarily discount the longer-term consequence. However, in contrast, trust pertains to anticipated consequences across a wide temporal range, including the relatively distant future. To level of analysis (Edmondson, 2004), team psychological safety is proposed to

characterize groups rather than describing individual or temperamental differences. Unlike team psychological safety, trust pertains primarily to dyadic relationship- whether between individuals or collectives such as firms (Edmondson, 2004). Edmondson (1999a) argue that team psychological safety involves but goes beyond interpersonal trust; it depicts a team climate characterized by interpersonal trust and mutual respect in which people are comfortable being themselves.

### **2.2.3 Antecedents and consequences of team psychological safety**

These paragraphs first propose antecedent conditions likely to give rise to psychological safety in work team. The following propositions that summarized by Edmondson (2004) focus on the team group or team context even though they were drawn from others research on individuals' experiences. There is little doubt that formal power relations affect perceptions of interpersonal risk in work place. Research has demonstrated that team members are less likely to ask for help from bosses than from peers or others (Lee, 1997) and they are particularly aware of the behavior of the leaders (Tyler & Lind, 1992), such that his or her responses to events and behaviors are likely to influence other members' perceptions of appropriate and safe behavior. Edmondson argues that three aspects of leader behavior will promote psychological safety: being available and approachable which refer as accessibility; explicitly inviting input and feedback; and modeling openness and fallibility (Edmondson, 2004). For leaders' accessibility, Edmondson argues that leaders may reduce perceived barriers that prohibit discussion by making themselves available and approachable, in contrast, team members would perceive their opinions are not welcomed or valued if leaders assume authoritative stances or act in punitive ways (Edmondson, 1996). To inviting input, similarly, leaders who explicitly ask for team members' input are likely to encourage team psychological safety. Soliciting feedback indicates to others that their opinion is respected, which may also contribute to as norm of active participation. In contrast, when leaders discourage input or discussion, team members are less likely to express their opinions, fearing potential negative consequences (Edmondson, 2004). Because of the implication of power in organizations, team members behave is likely to set an model of behavior in the team. Team members are likely to mimic the behaviors of leaders. If leaders are taciturn and their

behavior indicates that certain matters are best not discussed, team members will follow their example. If team members hear their leader admit to the group that he or she made a mistake, they are likely to remember this the next time they make mistakes and feel more comfortable bringing this up (Edmondson, 2004).

Trusting and respectful interpersonal relationship also promote psychological safety (May et al., 2004). Kahn (1990) concluded that: “interpersonal relationships [in the architecture firm] promoted psychological safety when they were supportive and trusting.” Informants in his study felt free to share ideas and concepts about designs when they believed that any criticism would be constructive rather than destructive (Kahn, 1990). The belief that others see one as competent (an aspect of respect) is particularly salient; those who feel that their capability is in question are more likely to feel judged or monitored by others and thus may keep their opinions to themselves for fear of harming their reputation (Moingeon & Edmondson, 1998). In addition to leaders’ behavior and trust and respect, organizational context support experienced by a team is also proposed to foster team psychological safety as well, because access to resources and information is likely to reduce insecurity and defensiveness in a team, such as caused by concerns about unequal distribution of resources within or between an organization’s team (Edmondson, 2004). Studies have shown that team psychological safety plays important role in transmitting effects. Empirical study indicated that team psychological is a mediator for the link between team leader coaching, contextual support and team learning, which means that effective team leader coaching and contextual support will promote team psychological safety (Edmondson, 1999a).

Kahn (1990) found that psychological safety “shaped how people inhabited their roles [in the organization].” Psychological safety is likely to affect behaviors related to learning and improvement (Edmondson, 1999a, 1999c), such as help-seeking behavior, feedback-seeking, speak up about errors and concerns, innovative behavior and innovation, and boundary spanning behaviors; all of those behavior can be classified into learning-oriented (Edmondson, 2004). First, asking for help brings a potential risk of appearing incompetent, and – as psychological safety alleviates excessive concern about others’ reactions it is to promote help seeking in teams (Edmondson, 2004). Second, both help-seeking and feedback-seeking are often essential to successful task completion. Similar to help-seeking behavior,

feedback-seeking carries interpersonal risk. Request for feedback from others team members or other groups place the seekers in a vulnerable situation, where they are poised to hear negative criticism and may cause them anxiety driven by fear of losing “effectiveness and self-esteem”(Schein, 1996). In contrast, team psychological safety, which diminishes the concern that others respond in cruel or humiliating way, is likely to encourage feedback-seeking. It is noted that a team’s ability to seek feedback can have a significant effect on their performance, because teams are less able to notice and fix what they were doing wrong (Edmondson, 2004). Third, research on organizational silence indicates that sense of threat and/or risk is a key determinant of employees’ willingness to speak up freely (Ashford, Rothbard, Piderit, & Dutton, 1998; Detert & Edmondson, 2005; Edmondson, 1996, 1999a, 2003; Edmondson, Roberto, & Watkins, 2003; Milliken, Morrison, & Hewlin, 2003; Morrison & Phelps, 1991; Ryan & Oestreich, 1991). Changing of behaviors and speaking up freely occurs when people are to feel secure (Schein & Bennis, 1965). This is because psychological safety makes it possible for people to believe that the benefits of speaking up outweigh the costs (e.g., the potential embarrassment) for the speaker. The role of psychological safety is particularly salient in clinical team studies. Healthcare provides a good context in which to draw examples of speaking up—especially given recent public attention to the widespread problem of error in hospitals (Pear, 1999; Zuger, 1999). Remaining silent about a questionable medication order or decision could lead to serious patient injury. This is also the primary reason we consider that team psychological safety plays important roles in explaining the effects of paternalistic leadership in China teaching hospitals. Fourth, researcher argues that participative safety in teams encourage the freedom to offer new ideas and experiment with different behaviors without fear of looking stupid or being embarrassed (West, 1990). It not only influences quality of innovation, but also quantity of innovation (West, 1990). Fifth, boundary-spanning behavior refers to external communication with other groups, which involves interpersonal risk, including asking for help or resources, seeking feedback and delivering bad news such as delays or design problems (Edmondson, 2004). Those activities can help teams clarify performance requirements, obtain information and resources, and coordinate tasks with other groups. Past research has shown that boundary spanning promotes effective team performance (Ancona, 1990; Ancona & Caldwell, 1992). It

will be unrealized if team members are unwilling to incur the risks involved, because they wish to avoid appearing to have problems (Edmondson, 2004). Therefore, it can be concluded that team psychological safety is likely to foster boundary spanning behavior, because team members who are accustomed to taking interpersonal risks within the team may be able to transfer that behavior to other, external interactions (Edmondson, 1999b).

There are empirical studies clarified the effects of team psychological safety. In May, Gilson, & Harter's study, it shows that psychological safety promotes work engagement (May et al., 2004). In the manufacturing company study conducted by Edmonson, she found that team psychological safety can increase the chance of effortful, interpersonally risky, learning behavior, such as help seeking, experimentation and discussion of error (Edmondson, 1999a). The data shows that psychological safety promoted team learning, which in turn facilitated team performance through the organizational hierarchy (Edmondson, 1999a). Other studies on the effects of team psychological safety on team performance included two aspects: team innovation is a mediator for the relationship between team psychological safety and team performance; team psychological safety promote team performance through increasing team members work involvement (Edmondson, 1999a; Edmondson, Bohmer, & Pisano, 2001).

## **2.3 Description of Team Empowerment**

### **2.3.1 Definition and dimensions of team empowerment**

Surveys have shown that empowerment has significant influence on management practice, as more than 70% of organizations have implemented some form of empowerment for at least some part of their workforce (Lawler, Mohrman, & Benson, 2001), which generates considerable research interest on empowerment.

Contemporary management scholars and practitioners have put forward three different lenses to study and understand empowerment: the social-structural perspective, the psychological perspective, and the critical perspective. The social-structural perspective roots in the values and ideals of democracy. In this perspective, empowerment is linked to a belief in a democratic polity where power resides in individuals at all levels of a system (Prasad & Eylon, 2001).

Accordingly, the focus of this social-structural perspective is on sharing power throughout a system, where power is conceptualized as having formal authority or control over organizational resources (Conger & Kanungo, 1988). It emphasizes the significance of changing organizational policies, practices, and structures away from top-down control systems toward high involvement practices (Bowen & Lawler, 1995). This perspective focuses on the organization.

In contrast to the social-structural perspective which equated empowerment with the delegation of authority and resources sharing, Conger and Kanungo (1988) who were among the first to define empowerment from psychological perspective and viewed empowerment as enabling or enhancing personal efficacy. Thomas and Velthouse (1990) expanded upon this work and articulated a more complete theoretical framework by defining empowerment as intrinsic task motivation consisting of four dimensions: meaning, competence, self-determination, and choice. Spreitzer (1995) firstly developed a multidimensional instrument to assess psychological empowerment. Based on the work of Thomas and Velthouse (1990), she defined individual-level psychological empowerment as intrinsic task motivation reflecting a sense of control in relation to one's work and an active orientation to one's work role that is manifest in four cognitions: meaning, self-determination, competence, and impact. Meaning means the alignment between the demands of one's work role and one's own beliefs, values, and standards (Hackman & Oldham, 1980). Self-determination refers to one's sense of choice concerning the initiation or regulation of one's action (Deci & Ryan, 1985). Competence is one's belief in one's capability to successfully perform work activities (Bandura, 1989; Lawler, 1973). Finally, impact refers to one's belief that one can influence strategic, administrative, or operational activities and outcomes in one's work unit (Abramson, Seligman, & Teasdale, 1978; Ashforth, 1989).

The critical perspective of empowerment which is still at early stage has roots in postmodern theory and deconstructionism (Spreitzer & Doneson, 2005). Theorists argue that without the formal power structures of direct worker ownership and representation, typical empowerment interventions are in fact disempowering (Wendt, 2001) because real power still resides at the top of the organization (Boje & Rosalie, 2001). This perspective helps bring the notion power

back to the dialogue on empowerment and focuses on the political nature of empowerment and the potential for domination.

Considering the characteristics of Chinese traditional culture that rooted in all organizations and nature of the three perspectives of empowerment, in this study, we focus on psychological empowerment which emphasizes drilling down to the individual and their experience.

As stated above, empowerment has been conceptualized and empirically examined primarily at the individual level of analysis (Conger & Kanungo, 1988; Ford & Fottler, 1995; Koberg et al., 1999; Liden, Wayne, & Sparrowe, 2000; Spreitzer, 1995, 1996; Spreitzer, Kizilos, & Nason, 1997; Thomas & Velthouse, 1990). While individual psychological empowerment emphasizes how empowered the individual feels personally, team empowerment means shared perceptions among team members regarding the team's collective level of empowerment (Chen, Kirkman, Kanfer, Allen, & Rosen, 2007), that is, socially constructed (Gilson, 2001). Therefore, it's well argued that team empowerment is defined as increased task motivation that is due to team members' collective, positive assessments of their organizational tasks (Kirkman & Rosen, 1999). Team empowerment includes four dimensions: meaningfulness, autonomy, potency, and impact. Meaningfulness, corresponding to meaningfulness at the individual level of empowerment (Thomas & Velthouse, 1990), means team's experiencing its task as important, valuable, and worthwhile (Hackman, 1987; Hackman & Oldham, 1980). Team members collectively develop and share the meaningfulness of their tasks; therefore, they have direct effects on the experiences of meaningfulness of other members. Autonomy is the degree to which team members believe that they have freedom to make a decision, which parallels the individual-level empowerment construct of choice (Thomas & Velthouse, 1990). Important decisions are made and executed by teams, thus, high levels of team autonomy may actually decrease individual autonomy as important decision making is shared rather than carried out alone and responsibility is diffused rather than granted to a single individual (Uhl-Bien & Graen, 1998). Potency refers to the collective belief of a team that it can be effective and parallels the individual-level empowerment construct of competence, or self-efficacy (Conger & Kanungo, 1988; Thomas & Velthouse, 1990). However, potency is different from self-efficacy in three aspects: first is the level of analysis, self-efficacy refers to individual performance while potency refers to team performance; second, self-efficacy

experiences are private but potency experiences develop collectively; third, self-efficacy relates to specific task performance, while potency refers to generalized effectiveness (Guzzo, Yost, Campbell, & Shea, 1993). Impact means the extent to which team members feel that their tasks make significant organizational contributions (Kirkman & Rosen, 1997) and it is similar to impact at the individual level of analysis (Thomas & Velthouse, 1990). Team members seek out, share, and collectively understand feedback from other organization members and their interaction enables the gathering of more information on team impact from customers than individuals alone could gather (Ancona, 1990). Team empowerment is a dynamic motivational construct and a reflection of a team's motivation level at a given point. Whether members of a team feel empowerment or not depends on their assessments of job and organizational characteristics (Kirkman & Rosen, 1999).

It has been concluded that the generalizability of psychological empowerment has been clearly established (Spreitzer & Doneson, 2005) since empirical research has been conducted in a variety of different contexts: a large service organization (Liden et al., 2000), a Fortune 50 manufacturing (Spreitzer, 1995, 1996), lower level employees in the insurance industry (Spreitzer, 1995), diverse employees in the hospitality industry (Corsun & Enz, 1999; Sparrowe, 1994), hospital employees (Koberg et al., 1999; Kraimer, Seibert, & Liden, 1997), nurses' (Brancato, 2000), employees of an Israeli bank (Kark, Shamir, & Chen, 2003), rehabilitation employees (Miranda, 1999), a British government agency (Geelmuyden & Silvester, 1999), employees and managers in an aerospace corporation (Mishra, Mishra, & Spreitzer, 1998), and public employees in a state agency (Feldman & Khademian, 2003). Recent work has been developed to focus the notion of empowerment at a team level of analysis (Kirkman & Rosen, 1999).

Scholars (Chen et al., 2007; Kirkman & Rosen, 1997) proposed that empowerment shares similar meanings and functional relationships at the individual and team levels. Even though they have been vague about the specific type of homology, a recent meta-analytic review (Seibert, Wang, & Courtright, 2011) has confirmed the parallel constructs relationship that the magnitude of parallel antecedent and outcome relationship do not differ significantly across levels of analysis, between individual level and team level, which provided some evidence of identical homology across levels.



The four dimensions of team empowerment combine additively and mutually reinforce which means that even though a team may have little autonomy, members can still experience team empowerment to the extent that they feel a collective sense of potency, a high level of meaningfulness in the work, and a sense that the team's work has impact on stakeholders (Spreitzer, 1995). However, Kirkman, et al. (1999) confirmed that the four dimensions are distinct but related. Some scholars argue that together, these four dimensions reflect an active, rather than passive, orientation to one's work role. In other words, the experience of empowerment is manifest in all four dimensions – if any one dimension is missing, then the experience of empowerment will be limited (Spreitzer, 1995). Thus, employees feel psychologically empowered when they experience all four psychological states. In this way, empowerment is the “gestalt” of the four dimensions. This is consistent with previous theorizing (Thomas & Velthouse, 1990), the highest levels of intrinsic task motivation were proposed to emerge only when all four cognitions are high.

### **2.3.2 Antecedents and consequences of team empowerment**

Many factors have been identified to increase psychological empowerment. Several characteristics of organization design -- involving a wide span of control (Spreitzer, 1996), enriching job characteristics (Liden et al., 2000), and a supportive/affiliative unit climate/culture (Sparrowe, 1994; Spreitzer, 1996) -- have been found to relate to high levels of employee empowerment. Other research showed that high quality relationships (including LMX (Liden et al., 2000; Sparrowe, 1994), supportive peer and customer relationships (Corsun & Enz, 1999), sociopolitical support from leaders, peers and subordinates (Spreitzer, 1996), and leader approachability (Koberg et al., 1999) are also salient in facilitating empowerment. Furthermore, it is noteworthy that social support that refers to the extent to which elements in the work context provide an employee with social, and psychological resources (Spreitzer, 1996) is associated with psychological empowerment (Gomez & Rosen, 2001; Liden et al., 2000; Sparrowe, 1994). It includes the supportiveness of the climate of the organization, the employee's perception that the organization values and cares about him, and the level of trust the organization has in the employee, fairness perception, and social exchanges. Social support theorists (Hotfall, 1989; Taylor, 2007; Thoits, 1985) have suggested

that social support is a valuable resource that shapes people's perceptions and emotional reactions, which has been confirmed by considerable researches within organizational settings (Ng & Sorensen, 2008). Social support is thus likely to enhance perceptions of psychological empowerment and team empowerment.

In addition, research has found employee characteristics like organizational rank and tenure (Koberg et al., 1999) to be associated with higher levels of empowerment. Finally, there is evidence that transformational leadership by way of social identification enhanced employee empowerment (Kark et al., 2003; Lin, 2009).

Researches have shown that when employees feel empowered, they have more positive attitudes in terms of work/job satisfaction (Spreitzer et al., 1997) and organizational commitment (Liden et al., 2000). Furthermore, empowerment is related to promotion satisfaction, less propensity to turn over, and less job strain. In addition, empowerment also affects performance, such as managerial effectiveness and innovative behavior (Spreitzer, 1995), employee effectiveness (Spreitzer et al., 1997), employee productivity (Koberg et al., 1999), and work unit performance (Seibert, Silver, & Randolph, 2004). In an empirical study conducted in six 4-star to 5-star hotel in the Macau SAS China, Humborstad, et al. found that empowerment positively leads to higher service willingness and this relationship is mediated by performance-based rewards, and organizational and supervisor support, which gave supports how empowerment was facilitated in the high power-distance context of China (Humborstad, Humborstad, Whitfield, & Perry, 2008). On team level analysis of empowerment, empirical studies have indicated that it is positively related to team performance outcomes included productivity, proactivity and customer service; as well attitudinal outcome involving job satisfaction, organizational and team commitment (Kirkman & Rosen, 1999). There is also a meta-analytic review confirmed this. Furthermore, researcher also found that this significant correlation is higher in Asia than in North America that may be due to people are more sensitive to team empowerment in collectivist cultures (Seibert et al., 2011).

## **2.4 Hypotheses development**

#### **2.4.1 Paternalistic Leadership of Department Leaders, Team Psychological Safety, and Team Empowerment**

Leaders can supply information and resources related to improve team empowerment. There was a meta-analytic review indicated that leadership including authentic leadership, autonomy support from leader, charismatic leadership, communication with supervisor, developmental experience from leader, empowering leadership, leader approachability, leader-member exchange, leader support, managerial behavior, managerial control, participative leadership, trust in supervisor, supervisor supportiveness, supervisory working alliance, transformational leadership, trust in leader that defined as positive leader behaviors by the researcher is an antecedent of team empowerment. We argue that paternalistic leadership that is deemed as roots in high-distance cultures also has impact on team empowerment and there was some supports that the nourishing leadership consists of paternalistic behavior has found to be the most effective leadership style for employees to perceive empowerment, the following is authoritarian leadership. The mechanism may be different from that of western motivational leadership. Leaders who have more authority and resources than subordinates are more likely to shape team culture and relationship (Alderfer, 1987). Team members are particularly aware of the behavior of the leader (Tyler & Lind, 1992), which is particularly prominent in Chinese traditional culture. The authorities of leaders make them in shaping subordinate's work experience (Liden et al., 2000; Yukl, 2010) that they may increase employees' perception of empowerment. Therefore, we expect that the three dimensions of paternalistic leadership may influence team empowerment through team psychological safety.

First, authoritarian leadership could decrease team empowerment through team psychological safety.

In Chinese context, authoritarian leader tend to tightly control information which may include strategic or operational goals and resources, ignore subordinate's suggestion and feelings, belittle subordinate's contributions, undermine subordinate's competence, building a lofty image and acting in didactic style (Farh & Cheng, 2000), which may affect subordinates feeling of the value of their work and being refused by team, thus enhancing their feeling that

their work in the team are not meaningful nor have significant impact. Previous research in the job design area had demonstrated that meaningfulness is linked with internal work motivation (Fried & Ferris, 1987; Renn & Vandenberg, 1995). Hence, subordinates who feel less motivated invest themselves less into team work. Furthermore, the high hierarchy (Spreitzer, 2007) felt by subordinates and their sense that it's not appropriate for them as "out-team" members to determine work goals and strategies of the team, and being provided insufficient information by leaders, subordinates may experience less perception of autonomy in the team. Without positive motivation and respects from leaders, enough resources, nor freedom in determining team affairs, subordinates may also loss confidence in effectiveness of the team, thus the potency of team empowerment decrease accordingly. Therefore, it is expected that there is a negative relationship between authoritarian leadership and team empowerment.

We posit that one important mechanism underlying the relationship between authoritarian leadership and team empowerment is team psychological safety. Since authoritarian leaders may act in punitive ways or reduce discussions, make subordinates feel uneasy, oppresses, and ultimately result in negative social exchange, which trigger subordinate responses, including compliance, obedience, respect, fear and shame (Farh & Cheng, 2000). Those contribute to shared belief among team members towards subordinates being evaluated negatively and their opinions are not welcomed or valued (Edmondson, 1996) by team leader due to subordinates' awareness of leader's behavior. I argue that authoritarian leadership taps into the core of development of psychological safety.

Subordinates will change if they are to feel secure. However, lack of team psychological safety will make subordinates feel less motivation of work engagement (May et al., 2004), or trying novel ways of doing role-related tasks (Amabile, 1983). Hence, in order to avoid negative consequence, subordinates feel stress and withdraw of making team decisions freely, which affects their autonomy. Accordingly, subordinates cannot feel their tasks meaningful. By being evaluated as incompetent, or being ignorant, subordinates may not feel their work has great influence in such negative environment. Furthermore, subordinates who feel unsafe in team may lose confidence in team interpersonal environment, creativities of the team and thus affect their perception in team's potency of high effectiveness. Hence, when subordinates

feel lack of psychological safety and supportiveness, experienced negative social exchange, they feel less motivation of sense of control team work. Following this logic, authoritarian leadership of team /department leaders may therefore decrease team empowerment through its effects on team psychological safety.

*Hypothesis 1: Team psychological safety will mediate the negative relationship between authoritarian leadership of department leader and team empowerment.*

Second, I propose that benevolent leadership is positively related to team empowerment through team psychological safety. Different from authoritarian leadership, benevolent leaders provide individualized care and job security to subordinates, they treat team members as family members and provide support to subordinates in front of crisis. Furthermore, benevolent leaders protect subordinates' image through avoiding embarrassing subordinates in public (Farh & Cheng, 2000). All of such leader behaviors foster subordinates' perception of their work being positively valued and themselves being well accepted by leader, as well as feeling that their great contributions to the whole team and in turn obtain caring from leaders. Those positive perceptions will further motivate their feeling of free participation in team decision-making with sense of supportiveness from leaders, which in turn arouse subordinates' feeling of meaningful work and they contribute to because of their participation in creation. Moreover, when subordinates have confidence in their abilities and creation inspired by leaders, they experience more potency (Kirkman & Rosen, 1999). Researches have examined that subordinates who have developed better relationship with their leader (Aryee & Chen, 2006; Chen et al., 2007; Chen & Klimoski, 2003) which taps well into Chinese traditional culture of reciprocity reports more empowerment. Hence, I propose that benevolent leadership of team leader is positively associated with team empowerment.

I also propose that team psychological safety may play an important role in mediating department leader's benevolent behavior and team empowerment. First, as benevolent leaders' behavior is highly valued in Chinese context, such leadership behaviors create subordinates' perception of being positively evaluated. Following this logic, in a safe environment people will be more willing to take initiative and interpersonal risk. Hence, we

can conclude that benevolent leadership of department leaders and team psychological safety are positively associated. Second, perception of safe interpersonal relationship and risk-taking tend to inspire intrinsic task motivation such as engaging in team decision making more freely, which is essentially what benevolent leadership would do. Therefore, team empowerment would be encouraged. As such, it's reasonable to argue that team psychological safety would mediate the relationship between benevolent leadership of department leaders and team empowerment.

*Hypothesis2: Team psychological safety mediates the relationship between benevolent leadership of department leaders and team empowerment.*

Finally, I propose that moral leadership will positively affect team empowerment and such relationship is mediated by team psychological safety. A leader who holds high moral standards and demonstrates superior personal virtues and self-discipline tends to treat subordinates fairly and politely with sincerity and sensitivity, use authority properly, lead them by example, and give constructive feedback to employees. These behaviors are likely to shape work experience of followers, induce subordinates' identification with leader's values and goals, internalize leader's value and imitate leader's behavior. Such responses of subordinates and positive environment among team members may play important roles in an empowerment climate that subordinates percept of further team's and leader's goals and actively serving the team's interests without being micro-managed, and to act like owners of the team (O'Toole & Lawler, 2006), which means enhance subordinates' perception of autonomy. By coinciding with leader's value and team's goal, it's reasonable that subordinates feel their tasks are meaningful and have significant impact on team's future development following the goal. And subordinates tend to believe that through contribution, their team can be effective and productive. Hence, I expect a positive relationship between moral leadership of department leaders and team empowerment.

Also, I contend that team psychological safety may mediate the link between moral leadership and team empowerment. In China where has been Confucian ideal dominated for thousands of years, it's a basic requirement for leaders to demonstrate superior morality by performing

unselfishly and leading as an example. The emphasis of moral virtues of leaders is salient due to lack of protection for citizens against overwhelmingly penal in traditional China. Following this logic, these moral behaviors are likely to make subordinates perceive high level of safety in taking risk, leading to perception of psychological safety in working team. Team psychological safety in turn positively affects team members engagement, thus affects team empowerment on the basis of safety evaluation. Hence, the following hypothesis:

*Hypothesis3: Team psychological safety will mediate moral leadership of department leaders and team empowerment.*

#### **2.4.2 Team Psychological Safety, Team Empowerment, and Team Performance**

According to Kanfer's (1994) heuristic framework on work motivation, motivation constructs can be organized in terms of their conceptual proximity to action. Distal constructs, such as team psychological safety, may have influence on team performance through activating some proximal constructs, such as higher-order psychological beliefs. In this project, team psychological safety is posited to incur team empowerment, thereby indirectly affecting team performance. Given these arguments, I propose a model in which team psychological influence team performance through team empowerment.

Work performance refers to the performance directed toward formal tasks, duties, and responsibilities. In hospitals, work performance refers to the hospital operation, medical quality and safety monitor index (HMI) that can be evaluated in many aspects in terms of structure, process and outcome, including objective and subjective measures. In this project, we concerned subjective evaluation of department performance perceived by physicians and department leaders.

Subordinates work in teams that they feel secure for being positively evaluated and respected especially by leaders, are likely to take interpersonal risk and change. Thus subordinates feel comfortable in making decisions for team without being negative evaluated or criticized from both leaders and peers. The positive reaction from leaders may further help subordinates developing perception of their freedom in making decisions. The supportive environment and positive feedback from peers and leaders motivates subordinates to contribute to their team

they are belonging to by feeling of their decision and work play an important role in team's development. And they will also deem that their work is worthwhile and meaningful. Furthermore, through great contribution to the work, subordinates may feel confidence in team effectiveness.

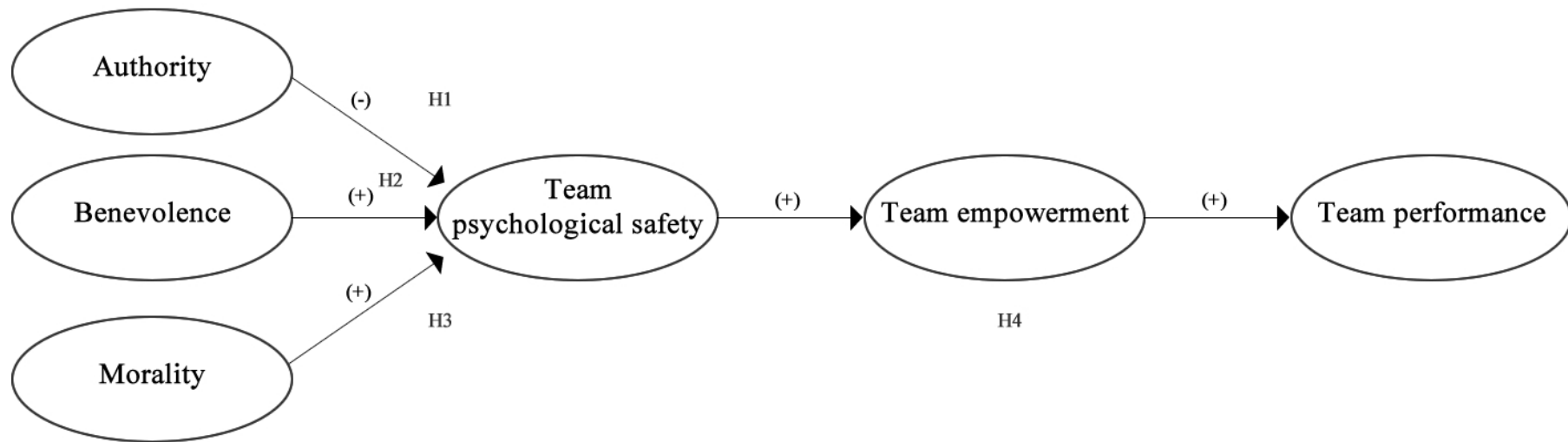
Team empowerment should contribute to team performance. Empowered teams are likely to be motivated by a sense of ownership or responsibility over their work; they are likely to take an active orientation toward their work and their work environment, seeking continuous improvement in work processes and seeking innovative solutions to work problems; and they are likely to strive to produce higher quality work products and services. Empowered teams are therefore likely to be more effective and productive. Furthermore, the positive effects of team empowerment for work teams have been supported by a growing body of theoretical and empirical researches (Burpitt & Bigoness, 1997; Hyatt & Ruddy, 1997; Kirkman & Rosen, 1997). Therefore, it's reasonable to propose the following hypothesis:

*Hypothesis4: Team empowerment will mediate the positive relationship between team psychological safety and team performance.*

Figure 3 summarized the hypotheses of this comprehensive model to investigate the mechanism that paternalistic leadership affects department performance in China teaching hospitals.



Figure 3. Hypothesized model





## **Chapter III: Research Methods**

### **3.1 Study Design**

To test the hypotheses in the PL model and answered research questions, I studied real work departments in Chinese teaching hospitals which have specific characteristics and similar structure as family business. The proposed hypotheses and questions are following:

1. Team psychological safety will mediate the negative relationship between authoritarian leadership of department leader and team empowerment.
2. Team psychological safety will mediate the positive relationship between benevolent leadership of department leaders and team empowerment.
3. Team psychological safety will positively mediate moral leadership of department leaders and team empowerment.
4. Team empowerment will mediate the positive relationship between team psychological safety and team performance.
5. What are the different types of PL leader that exist in China teaching hospitals, and are there differences in their effects on team psychological safety, team empowerment and team performance?

### **3.2 Population, sample, and selection procedure**

#### **3.2.1 Population**

There were 13850 public hospitals at the end of 2010 in China, among those 1258 were tertiary-level hospitals, 6104 were secondary-level hospitals. The classification is based on medicine technology, number of beds, hospital operation index, quality control, safety monitoring indicators. Both tertiary- and secondary-level hospitals (which are necessary condition for teaching hospitals) could be teaching hospitals. There was no statistics available on number of teaching hospitals in China. Based on researcher's perception of China teaching hospitals, every province/autonomous region/ municipality has more than 5 teaching hospitals. The number gets larger in resource-abundant regions such as provinces in the east and south

of China.

It is assumed that 6 months' work in the department enable the doctors to know their department leaders management style adequately. The targeted population in this project was clinical department leaders and physicians in China teaching hospitals with inclusion and exclusion criteria as following:

Inclusion criteria for department leaders: 1. Clinical department leaders who work in China teaching hospitals and have taken office equal or more than half a year; 2. Clinical department leaders agree to participate.

Exclusion criteria for department leaders: 1. Clinical department leaders who work in traditional Chinese medicine department, integrated traditional and western medicine department; non-clinical department; or anesthesia department; 2. Clinical department leaders who do not agree to participate; 3. Clinical department leaders who work in department with less than 4 eligible physicians.

Inclusion criteria for physicians: 1. Physicians from China teaching hospitals whose department leader has agreed to participate into this project; 2. Physicians who work as regular employees in the hospital which refers as physicians have formal working relationship with hospital studied; 3. Physicians who have worked together with their department leaders for more than 6 months; 4. Physicians who agree to participate.

Exclusion criteria for physicians: 1. Physicians whose department leaders refuse to participant; 2. Physicians who work in traditional Chinese medicine department, integrated traditional and western medicine department; non-clinical department; anesthesia department; 3. Physicians who do not agree to participate.

### **3.2.2 Sample and Selection procedure**

The theoretical model was examined in China teaching hospitals by convenience sampling. Based on my perception, each of the top 4 modern and fast developing cities (Shanghai, Guangzhou, Chengdu, and Beijing) has more than 15 teaching hospitals, for each teaching hospital more than 25 clinical departments and employs equal or more than 4 regular physicians for each department. There are relatively less numbers of teaching hospitals in other cities. Therefore, considering the response rate and exclusion of some department

leaders and physicians, 15 teaching hospitals were chosen in these four cities first by convenience sampling. For each hospital, the researcher conveniently sampled 18-22 clinical departments in which the department leaders and 4-12 physicians were surveyed so that the sample size was adequate for this research. The physicians were conveniently sampled according to name lists by research assistants who do not know the physicians.

### **3.3 Instrumentation**

All measures were reported by physicians except for one of team performance scale prepared for department leaders (See Table1). The scale items for paternalistic leadership were originally in Chinese. Other questionnaire items were originally in English and then were translated into Chinese by a bilingual speaker of Mandarin and English. The items were translated back to English by another bilingual speaker of Mandarin and English to ensure that both English and Mandarin version of items were comparable with high accuracy. All scale items were modified according to characteristics of China university hospitals and medical science. After that, several physicians, department leaders and hospital leaders were asked to help in revising the questionnaires for better application. All scales used 7-point Likert format (1= strongly disagree; 7=strongly agree).

Table 1. A summary of scales

Measure	Department leaders	Physicians
Paternalistic leadership scale		Y
Team psychological safety scale		Y
Team empowerment scale		Y
Team performance scale	Y	
Personal demographic information	Y	Y

*Note:* Y. The participant rated this scale

### 3.3.1 Paternalistic leadership scale

I measured all three dimensions of paternalistic leadership including benevolent leadership, moral leadership, and authoritarian leadership, using 18 items from Chen's scales (2011) (See appendix 3 and 4). Physicians were asked to rate the leadership style of their immediate department leaders with 6 items on benevolent leadership, 4 items on moral leadership, and 8 items on authoritarian leadership. All of Chen's subscales obtained high internal reliability coefficient larger than 0.80 in previous studies. This scale was modified from Cheng et al.'s (Cheng et al., 2000) 28-item scale and administered to top management teams in China companies. The domain of authoritarian leadership in Cheng et al.'s (Cheng et al., 2000) and Chen's 18-item scale (2011) includes powerfully subduing, referring to insisting on complete obedience from followers; authority and control, referring to having a final say on all key decisions in the workplace; intention biding, referring to keeping distance from followers; rigorousness, referring to imposing strict discipline on followers and doctrine, referring to instructing followers to achieve high performance. The domain of benevolent leadership contains individual care, and understanding and forgiving. The domain of moral leadership includes integrity and fulfilling one's obligations, never taking advantage of others, and the selfless paragon. A sample item for benevolent leadership in my research is "My department leader takes good care of family members of department members as well". A sample item for moral leadership is "My department leader does not use his/her authority to seek special

privileges for him/her”. A sample item for authoritarian leadership is “My department leader always has the last say in the meeting”.

### **3.3.2 Team psychological safety**

Edmondson’s team psychological safety scale (Edmondson, 1999a) including 7 items (See appendix 5 and 6) with three reverse items was used to obtain self-report measure of team psychological safety from physicians. The scale was developed by Edmondson based on qualitative data obtained from interviews and adopted in a quantitative study in a manufacturer of office furniture in USA. The internal reliability coefficient in Edmondson’s study was 0.82. A sample item is “It is safe to take a risk on this department; we are free to express and try even risky things”.

### **3.3.3 Team empowerment**

Team empowerment scale was developed by Kirkman and Rosen’s (1999) with 26 items; I adopted Kirkman, Rosen, Tesluk and Gibson’s (2004) short-version 12-item scale developed in 2004 including four dimensions: potency, meaningfulness, autonomy, and impact (See appendix 7 and 8). Each dimension has 3 items. The reliability coefficient was .93 in Kirkman et al.’s study with samples from 2 fortune 50 organizations and 2 smaller companies, including 2 textile manufacturers, a high-technology manufacturer, and an insurance company.

### **3.3.4 Team performance**

In this study, department performance is equivalent to team performance which refers to outcomes of a particular group. The performance measure can be objective or subjective and many scales can be used to evaluate team performance (Edmondson, 1999a; Hackman, 1987; Hackman, Baker, Tjoscold, & IR., 1987). In my project, I adopted subjective measure. Department leaders were asked to fill in scale that translated and tested by Chen et al. (2009) to evaluate team performance (See appendix 9 and 10). This was originally developed by Edmonson for the observers in the study. Chen et al. (2009) translated and used this scale for team members and obtained the internal reliability coefficient 0.838.

### **3.3.5 Demographic data survey instrument**

There were two forms for collecting personal and departmental information from department leader and physicians respectively. For physician's form (See appendix 11 and 12), it included (a) gender; (b) age; (c) education background, which is classified as below bachelor's, bachelor's, master's, doctor's; (d) years working in current hospital; (e) total years of work experience; (f) professional title, which is classified as highest senior, senior, intermediated title, junior and below. For department leader's form (See appendix 13 and 14), it also included years of working as department leader; years of department has been established.

### **3.4 Data collection**

Survey packages were delivered to participants, each containing a cover letter (See appendix 1 and 2), questionnaires and a return envelope.

6 undergraduate students worked as research assistants to deliver the questionnaires. All of them have medicine background and received training conducted by the researcher before the field study. The contents of training included the importance and purpose of the study, research methods, characteristics of hospitals and physicians, standard operation procedure, and frequently asked questions. In the training, all research assistants were required to role play.

Data were collected from 15 teaching hospitals that are conveniently sampled. At the beginning, the researcher made telephone calls to hospital leaders to get their permission to visit their hospitals and distribute the instruments. Through the phone call, the researcher explained the importance and purpose of the study.

After obtaining permission from hospital leaders, CEO office were contacted to obtain demographic information of department leaders and physicians for sampling and asked to encourage department leaders and physicians to take part in the study. Based on the information list, convenience sampling was conducted on department level. After getting permission from department leaders, random sampling on physician level in each department



was conducted.

5 employees from CEO office were gathered and matched with 5 research assistants for each group with 1 employee and 1 research assistant. Each group (5 groups in all) took charge of 4 departments or so. The other one research assistant was responsible for coordination in the delivering. Workers from CEO office were responsible to introduce the research assistants to department leaders and physicians. The research assistants gave instructions to participants in verbal. We distributed the questionnaires during the morning meeting which almost all of department leaders and physicians would participated. The research assistant collected the questionnaires immediately or 20-90 minutes later due to the busy schedule of physicians. Physicians working in surgery department would leave for operation after the meeting, hence, employee from CEO office and research assistant were asked to visit surgery departments first and then the internal departments. After collecting all the completed questionnaires, invalid questionnaires were excluded (those with too many missing responses or obvious response biases) before proceeding with statistical analysis.

Department leaders and physicians were both informed in verbal that their responses to the questionnaires would be kept confidential. To achieve this, each participant was asked to return their questionnaires in a sealed envelope.

### **3.5 Level of analysis**

Researchers can measure group-level phenomena using individual member data in at least three ways (Tetlock & Zaccaro, 1997). First, respondents rate themselves on their individual attributes, and researchers then aggregate these data to the group level. Second, individuals rate their groups or teams on particular attributes (rather than rate their own attributes as individuals), and these ratings can be averaged to form a group score, see (Campion, Medsker, & Higgs, 1993; Campion, Papper, & Medsker, 1996; Hyatt & Ruddy, 1997) for examples. Third, groups can provide consensus survey ratings. Following the recommendations of previous researchers (Campion et al., 1993; Guzzo et al., 1993), we measured paternalistic leadership, team psychological safety, team empowerment by physicians giving score of their department and department leader on particular behaviors and attributes. Hence, the measures

used in this study except for team performance must be averaged after ensuring that there is good within group agreement.

To test whether there was agreement within department, the formular for multiple-item estimator of  $r_{wg(j)}$  developed by James, Demaree, and Wolf (James, Demaree, & Wolf, 1984, 1993) was used. A value of 0.70 or above is considered good within-group interrater agreement. First, the researcher estimated within-group interrater reliabilities  $r_{wg(j)}$  for each of the departments for benevolent leadership, moral leadership and authoritarian leadership of department leaders, team psychological safety, and team empowerment using formula below:

$$r_{wg(j)} = \frac{J [ 1 - \bar{S}_{xj}^2 / \sigma_{EU}^2 ]}{J [ 1 - (\bar{S}_{xj}^2 / \sigma_{EU}^2) ] + (\bar{S}_{xj}^2 / \sigma_{EU}^2)} \quad (1)$$

The expected random variance for each department was designated as 4 since I adopted 7-item measure (James et al., 1984). Then, the average for each of the five aggregated variables as the final value of  $r_{wg(j)}$  was calculated as shown in Table 2. Overall, values of  $r_{wg(j)}$  were well above 0.70.

In addition, the researcher ran an analysis of variance to ensure that the variance between departments was greater than the variance within department (this was positively confirmed for each variables shown below). Furthermore, the intraclass correlation coefficients, ICC(1) and ICC(2) were also calculated. The resulting ICC(1) less than 0.5 and/or ICC(2) larger than 0.7 indicates that a team membership accounted for a reasonable proportion of the variance in individual responses on group-level attributes (James, 1982). All of values on ICC(1) and ICC(2) in this study as shown in Table 2 satisfied the standardization.

Table 2. A summary of  $r_{wg(j)}$ , ICC(1), ICC(2) and F-value for team empowerment, team psychological safety and three dimensions of paternalistic leadership

Variables	$r_{wg(j)}$	ICC(1)	ICC(2)	F
Benevolence	0.76	0.3125	0.9926	3.0950
Morality	0.80	0.2963	0.9920	2.8840
Authority	0.95	0.2504	0.9900	2.2540
Team psychological safety	0.85	0.2306	0.9889	2.0660
Team empowerment	0.86	0.2847	0.9916	2.6920

All F-values are significant at 0.001 level

### 3.6 Data analysis

The collected data was analyzed by using the statistical package for the social science (SPSS 11.7) for Microsoft Windows, which included descriptive analysis and inferential analysis. Descriptive analysis included classification of PL types, calculation of frequency of categorical data and the means, range, mode, standard deviation of continuous data. The inferential analysis examined the relationship between every 2 variables. The 0.05 level of statistical significance was set for all of the statistical computations.

The researcher simultaneously entered the three dimensions of paternalistic leadership and team empowerment, team psychological, and team performance in the Structural Equation Model (SEM) using Linear Structural RELations (LISREL) to test all 4 hypotheses.



## Chapter IV: Results

The purpose of this study was to examine effects of PL types and investigate the mechanism how three dimensions of paternalistic leadership have impact on department performance in China teaching hospitals. Based on data collected from department leaders and physicians, the following five hypotheses and questions were examined and answered in this section:

In China teaching hospitals,

1. Team psychological safety will mediate the negative relationship between authoritarian leadership of department leader and team empowerment.
2. Team psychological safety will mediate the positive relationship between benevolent leadership of department leaders and team empowerment.
3. Team psychological safety will positively mediate moral leadership of department leaders and team empowerment.
4. Team empowerment will mediate the positive relationship between team psychological safety and team performance.
5. What are the different types of PL leader that exist in China teaching hospitals, and are there differences in their effects on team psychological safety, team empowerment and team performance?

### 4.1 Response rate

305 department leaders and 2603 physicians from 15 China teaching hospitals in Guangzhou, Chengdu, Shanghai, and Beijing were surveyed. A total of 2754 participants (296 department leaders and 2458 physicians) responded to the survey, which demonstrated an overall response rate of 94.70 %. Picking out invalid questionnaires, an overall effective response rate was 89.27%. Table 3 shows a summary of the response rate.

Table 3. A summary of response rate

	Sampling Number	Returned Number	Response Rate	Effective Number	Effective Response Rate
Department leaders	305	296	97.05%	282	92.46%
Physicians	2603	2458	94.43%	2314	88.90%
Total	2908	2754	94.70%	2596	89.27%

#### 4.2 Descriptive statistics of the sample

In this study, 27 departments have been established for 1-5 years, 30 departments have been built 6-10 years, and 232 departments have been built more than 10 years. There were 7 departments did not provide information on year of establishment.

The type of departments included in this study were following: Ophthalmology Department, Otolaryngology Department, Emergency Department, Neurology Department, Neurosurgery Department, Intensive Care Unit, Department of Hepatobiliary Surgery, Department of Gastroenterology, Department of Cardiac Surgery, Department of Thoracic Surgery, Department Of Respiratory Medicine, Gynecology Department, Obstetrics Department, Pediatrics Department, Reproductive Medicine Department, Orthopedics Department, Department of Thyroid Breast Surgery, Nephrology Department, Endocrinology Department, Rheumatism department, Hematology department, Organ transplantation department, Oncology Department, Rehabilitation Department, Department of Geriatrics and Gerontology, Department of Cardiology, Department of Trauma, Burns Department, Spinal Surgery Department, General Surgery Department.

Table 4 provides a summary of the descriptive statistics of department leaders and departments. From the table, it can be said that the department leaders' mean age was 49.6. Most of them were male and obtained highest senior title in professional area. The sample

mean of tenure, years of working in the current hospital, and years as department leader were 27.81, 19.14, 7.48 respectively. More than a half of department leader obtained doctor's degree.

Table 4. Descriptive statistics of department leaders

Variable	N	Percentage	Mean (years)	Standard deviation	Mode (years)	Range (years)
Gender						
Male	205	79.46				
Female	53	20.54				
Total	258					
Age	254		49.60	4.48	50	38-61
Tenure	258		27.81	5.79	30	15-45
Year work in current hospital	261		19.14	8.32	20	1-40
Years as department leader	255		7.48	4.92	10	0.5-30
Professional title						
Highest senior	229	87.40				
Senior	33	12.60				
Total	262					
Education background						
Doctor's	138	52.27				
Master's	55	20.83				
Bachelor's	66	25.00				
Below bachelor's	5	1.89				
Total	264					



Table 5 provides a summary of descriptive analysis of physicians included in the study. The mean age of included physicians was 37.48. The majority of physicians were male. The sample mean of tenure, and years of working in the current hospital were 13.40, 10.82 respectively. Less than 1% of physicians did not obtain bachelor's or above degree.

Table 5. Descriptive statistics of physicians

Variable	N	Percentage	Mean (years)	Standard deviation	Mode (years)	Range (years)
Gender						
Male	1443	64.53				
Female	793	35.47				
Total	2236					
Age						
	2211		37.48	7.91	30	19-80
Tenure						
	2220		13.40	9.19	20	0.5-54
Year work in current hospital						
	2200		10.82	8.22	10	0.5-54
Professional title						
Highest senior	268	11.83				
Senior	675	29.80				
Intermediate title	791	34.92				
Junior and below	531	23.44				
Total	2265					
Education background						
Doctor's	679	29.94				
Master's	875	38.58				
Bachelor's	692	30.51				
Below bachelor's	22	0.97				
Total	2268					

#### 4.3 Descriptive statistics and correlations of key variables

Table 6 presents the means, standard deviation, and intercorrelations of all key variables.

As shown in Table 6, means of all scales except of authoritarian leadership were farther larger than 4 which is the mid-point the absolute scales using 7-point Likert format. The largest was team performance (6.20). Those revealed the tendency that Chinese give positive evaluation on their leaders and leaders tend to give more positive evaluation on the achievements of their teams. Mean of authoritarian leadership is slightly lower than 4 (3.71).

Benevolent leadership was significantly correlated with team psychological safety ( $r=0.679$ ,  $p<0.01$ ) and team empowerment ( $r=0.709$ ,  $p<0.01$ ). Authoritarian leadership was significantly correlated with team psychological safety ( $r=-0.304$ ,  $p<0.01$ ) and team empowerment ( $r=-0.337$ ,  $p<0.01$ ). Moral leadership was significantly correlated with team psychological safety ( $r=0.643$ ,  $p<0.01$ ), team empowerment ( $r=0.714$ ,  $p<0.01$ ) and team performance ( $r=0.138$ ,  $p<0.05$ ).

Table 6. Mean, Std.Deviation, Pearson's correlation of variables

	N	Mean	Std. Deviation	1	2	3	4	5	6
1.Benevolent leadership	296	5.36	0.70	1.000					
2.Authoritarian leadership	296	3.71	0.72	-.553**	1.000				
3.Moral leadership	296	5.61	0.69	.913**	-.568**	1.000			
4.Team psychological safety	296	4.91	0.56	.679**	-.304**	.643**	1.000		
5.Team empowerment	296	5.58	0.50	.709**	-.337**	.714**	.735**	1.000	
6.Team performance	271	6.20	0.81	.112	-.036	.138*	.109	.224**	1.000
Valid N (listwise)	271								

\*\* . Correlation is significant at the 0.01 level (2-tailed).

\*. Correlation is significant at the 0.05 level (2-tailed).

#### 4.4 Validity and reliability of the instrument

Before testing the hypotheses, an analysis of the measurement characteristics of the model was conducted using LISREL 8.70. Analysis of both the measurement and structural models used matrices generated by PRELIS (Joreskog & Sorbom, 1989). Missing values were deleted listwise. It must be noted that using confirmatory factor analysis to refine a scale through the elimination of items is, in part, an exploratory procedure. Table 7 and Table 8 summarize the results of the confirmatory factor analysis of the measurement model as well as Cronbach's alpha coefficients ( $\alpha$ ) obtained by conducting reliability analysis using SPSS.

Previous researcher argued that items of team empowerment can be combined into a single, global scale instead of four factors (Kirkman et al., 2004) due to high intercorrelations of four subscales. A meta-analysis of psychological empowerment also give some supports (Seibert et al., 2011). Hence, an exploratory analysis (principal component analysis with varimax rotation) was conducted to confirm the factor structure of the items of team empowerment scale and found supports in Kaiser-Meyer-Olkin value, Barlett significant value, Chi-square value and % of variance for unitary team empowerment as shown in Table 8. We also conducted intercorelation analysis between dimensions of team empowerment. As shown in Table 9, all dimensions are significantly correlated each other, and the smallest correlation coefficients is 0.653 between impact and meaningfulness, and between impact and autonomy. Given the high intercorrelation of four dimensions of team empowerment, the results of a principal components analysis, and an acceptable level of fit using one-factor confirmatory factor analysis, the researcher combined 12 items into a single, global scale.

In order to maintain the reliability of the instruments, the item that cause the Cronbach's alpha coefficients of the factor lower than 0.70 was taken out of the analysis. All of the items in benevolent leadership, moral leadership, team psychological safety, team empowerment and team performance were used in this study and the Cronbach's alpha values were 0.935, 0.931, 0.828, 0.938, and 0.884 respectively. The last item of authoritarian leadership "We have to follow his/her rules to get things done. If not, he/she punishes us severely" that obtained low factor loading and caused low Cronbach's alpha coefficients was eliminated. After deleting this item, the Cronbach's alpha was 0.881 as shown in Table 7.

Table 7. Confirmatory Factor Analysis results-Three dimensions of PL items

Factor	Scale Item	Factor Loading	$\alpha$
Benevolent leadership			0.935
	1. My supervisor devotes all his/her energy to taking care of department members.	0.91	
	2. My supervisor takes good care of family members of department members as well.	0.88	
	3. My supervisor will help us when we're in an emergency.	0.90	
	4. My supervisor tries to understand what the cause is when members do not perform well.	0.87	
	5. My supervisor will provide us chance for correcting mistakes.	0.82	
	6. My supervisor will not embarrass subordinates in public.	0.74	
Moral leadership			0.931
	7. My supervisor never "passing the buck" in front of working problems.	0.81	
	8. My supervisor does not use <i>guanxi</i> (personal relationship) or back-door practices to obtain illicit personal gains.	0.84	
	9. My supervisor does not use his/her authority to seek special privileges for himself/herself.	0.91	
	10. My supervisor acts as an exemplar in work and personal conduct.	0.93	
Authoritarian leadership			0.881

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11. My supervisor asks us to obey his/her instructions completely.	0.56
12. My supervisor will avenge us if we express objection in public.	0.81
13. My supervisor determines all decisions in the department whether they are important or not.	0.87
14. My supervisor always has the last say in the meeting.	0.69
15. My supervisor never leaks his/her real thoughts to us.	0.79
16. Our department members feel pressured when working with him/her.	0.80
17. My supervisor scolds us when we cannot accomplish our tasks.	0.78
18. We have to follow his/her rules to get things done. If not, he/she punishes us severely.	0.12 (deleted)

Measures of Goodness of Fit

Chi-Square = 461.62

Degrees of Freedom = 116

Chi-Square/Degrees of Freedom = 3.98

Comparative Fit Index [CFI] = 0.97

Normed Fit Index [NFI] = 0.96

Root Mean Square Error of Approximation [RMSEA] = 0.10

Standardized Root Mean Square Residual = 0.063

Table 8. Confirmatory Factor Analysis results-team psychological safety, team empowerment and team performance

Factor	Scale Item	Factor Loading	$\alpha$
Team Psychological Safety			0.828
	1. If a member makes a mistake on this team, it is often held against he/her.	0.53	
	2. Members on this department are able to bring up problems and tough issues.	0.49	
	3. Members on this department sometimes reject others for being different.	0.59	
	4. It is safe to take a risk on this team, we are free to express and try even risky things.	0.64	
	5. It is easy to ask other members of this department for help.	0.79	
	6. No one on this team would deliberately act in a way that undermines other member's effort for his/her own interest.	0.63	
	7. Working with members of this team, my unique skills and talents are valued and utilized.	0.76	
Team Empowerment			0.938
	1. My department has confidence in itself. (Potency)	0.86	
	2. My department can get a lot done when it works hard. (Potency)	0.71	
	3. My department believes that it can be very productive.	0.78	



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(Potency)

4. My department believes that its work is significant. 0.75

(Meaningfulness)

5. My department feels that its tasks are worthwhile. 0.82

(Meaningfulness)

6. My department feels that its work is meaningful. 0.78

(Meaningfulness)

7. My department can select creative ways to do the department's work. (Autonomy) 0.82

8. My department determines as a team how things are done. (Autonomy) 0.71

9. My department makes its own choices to do things without being told in the team. (Autonomy) 0.52

10. My department has a positive impact on this hospital's patients as well as their family members. (Impact) 0.59

11. My department performs tasks that matters to this hospital. (Impact) 0.58

12. My department makes a difference in this hospital. (Impact) 0.70

Kaiser-Meyer-Olkin value: 0.938; *df*: 66

Bartlett significance value: 0.000;

Chi-square value: 2950.673

% of variance: 63.566

Team

0.884

Performance

1. This department meets or exceeds customers' (inner and outer) expectations. 0.82

2. This department does superb work.	0.93
3. Critical quality errors never happened in our department.	0.70
4. Our department keeps getting better and better.	0.80

#### Measures of Goodness of Fit

Chi-Square = 784.13

Degrees of Freedom = 227

Chi-Square/Degrees of Freedom = 3.45

Comparative Fit Index [CFI] = 0.96

Normed Fit Index [NFI] = 0.94

Root Mean Square Error of Approximation [RMSEA] = 0.091

Standardized Root Mean Square Residual = 0.069

Table 9. Dimensions of team empowerment intercorrelation

	Potency	Meaningfulness	Autonomy	Impact
Potency	1.000			
Meaningfulness	0.817**	1.000		
Autonomy	0.718**	0.725**	1.000	
Impact	0.695**	0.653**	0.653**	1.000

\*\* . Correlation is significant at the 0.01 level (2-tailed).

## 4.5 Research questions

### 4.5.1 Theoretical model

The hypothesized model is shown in Figure 3. The hypothesized path model was tested using

structural equation model (SEM), and the results of path analysis showed that the link between authoritarian leadership and team psychological safety is insignificant. Therefore, the researcher modified the hypothesized model to be the final model by eliminating the insignificant path from authoritarian leadership to team psychological safety (which was referred as Model 1 in Table 10, as shown in Figure 4). Results of path analyses showed that all path coefficients were significant at 0.05 levels or better. Furthermore, the revised model also showed a good model fit ( $\chi^2 = 2705.64$ ,  $d.f. = 733$ ,  $\chi^2/d.f. = 3.69$ , RMSEA = 0.100, NFI = 0.95, CFI = 0.96, SRMR = 0.081), providing overall support for the revised model.

In order to examine the mediating effects of team psychological safety and team empowerment, the researcher also built some alternative models (Table 10). There are four alternative models by adding direct path from independent variables to dependent variable, by treating team psychological safety and team empowerment as parallel mediators, and by exchanging the sequence of mediators. For model 2, the researcher added a direct path from moral leadership to team empowerment and revised the insignificant link from moral to team psychological safety caused by adding the path. For model 3, the researcher exchanged the sequence of team psychological safety and team empowerment. For model 4, team psychological safety and team empowerment are parallel mediators and the researcher deleted the insignificant link from moral leadership to team psychological safety. Shown from the model fit comparison as shown in Table 9, there was not significantly different. Considering the simplicity and theoretical supports, the researcher chose Model I as the final model. Figure 4 shows this model, with path coefficients.

Table 10. Results of theoretical model fits

Structural Equation Model					chi-square	<i>d.f.</i>	chi-square/ <i>d.f.</i>	RMSEA	NFI	NNFI	CFI	RMR	SRMR
M1	BL	TPS, ML	TPS, TPS	TE,	2705.64	733	3.691	0.100	0.950	0.960	0.960	0.048	0.081
	TE	TP											
M2	BL	TPS, ML	TE, TPS	TE,	2679.07	733	3.655	0.101	0.950	0.960	0.960	0.048	0.080
	TE	TP											
M3	BL	TE, ML	TE, AL	TE,	2936.66	732	4.012	0.101	0.950	0.960	0.960	0.052	0.087
	TE	TPS, TPS	TP										
M4	BL	TE, ML	TE, AL	TE,	2480.49	730	3.398	0.096	0.950	0.960	0.960	0.047	0.081
	BL	TPS, AL	TPS, TPS	TP,									
	TE	TP											

Model 1 represents the final model that revised from the initial hypothesis model (See Figure 2).

Model 2 adds a direct effect from moral leadership to team empowerment and deleted the path from moral leadership to team psychological safety that cause by adding the new path.

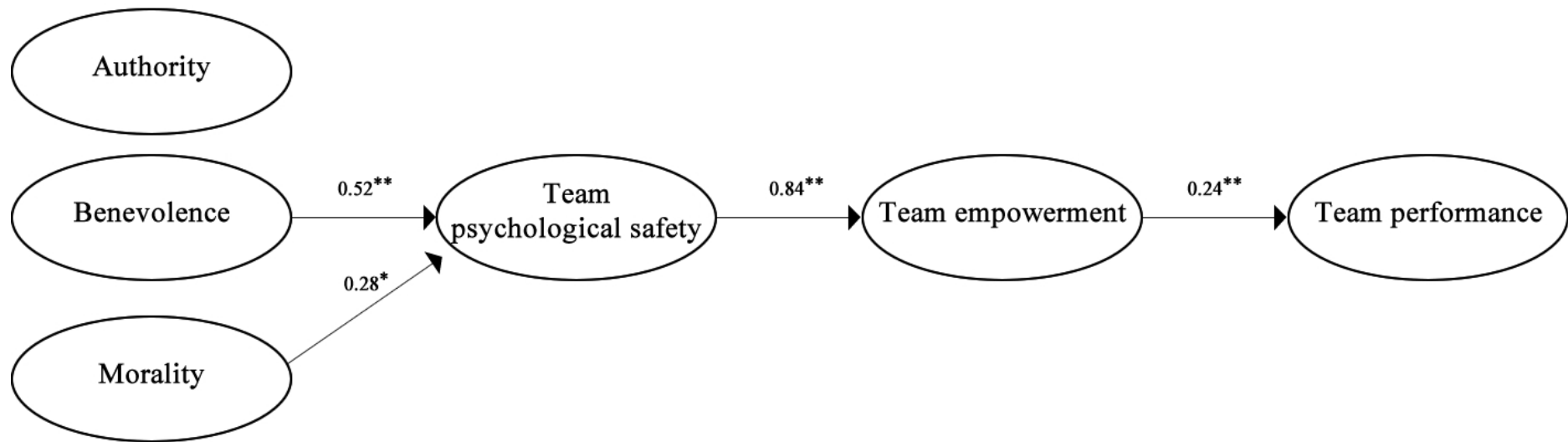
Model 3 makes a reverse cause model in which team empowerment mediates team psychological safety and team performance variables.

Model 4 treats team psychological safety and team empowerment parallel mediators.

BL. Benevolent leadership; ML. Moral leadership; AL. Authority leadership; TPS. Team psychological safety; TE. Team empowerment; TP. Team performance.

*d.f.*. Degree of Freedom; RMSEA. Root Mean Square Error of Approximation; NFI. Normed Fit Index; NNFI. Non-Normed Fit Index; CFI. Comparative Fit Index; RMR. Root Mean Square Residual; SRMR. Standardized RMR.

Figure 4. Final model (Model 1)



Note: \*\* $p < 0.01$ ; \* $p < 0.05$

It was confirmed the expectation that there is a positive relationship between benevolent leadership and team psychological safety ( $\beta=0.52$ ,  $p<0.01$ ) and a positive relationship between moral leadership and team psychological safety ( $\beta=0.28$ ,  $p<0.05$ ). Results from the path analysis also indicated that team psychological safety was positively related to team empowerment ( $\beta=0.84$ ,  $p<0.01$ ) and team empowerment was positively related to team performance ( $\beta=0.24$ ,  $p<0.01$ ). The indirect effects of benevolent leadership and moral leadership on team empowerment through team psychological safety were 0.44 ( $p<0.05$ ) and 0.24 ( $p<0.05$ ) respectively. The indirect effect of team psychological safety on team performance through team empowerment was 0.20 ( $p<0.05$ ). The results demonstrated that hypothesis two, three and four were supported. However, the relationship between authoritarian leadership and team psychological safety was not significant. Therefore, hypothesis one was rejected. As such, team psychological safety is a mediator for the link between benevolent leadership and team empowerment, and between moral leadership and team empowerment; and then team empowerment mediated the relationship between team psychological safety and team performance. But team psychological safety did not mediate the link between authoritarian leadership and team empowerment.

#### **4.5.2 PL types and their effects**

To answer what are the difference types existed in China teaching hospitals, following Farh, et al. (2008), Smith and Foti (1998), and Lord and Maher (1991), we dichotomized each of the three dimensions of paternalistic leadership using the mean of the absolute values as a split (High versus Low, High refers to higher than the mean score. Low refers to lower than the mean score). They together produce 8 types of PL leader and I labeled them as previous researched did (Farh et al., 2008).

Type 1 leader is characterized by low benevolence, low morality, and low authority; it is labeled as “Laissez-faire”.

Type 2 is low benevolence, low authority and high morality, and referred as “Ideological” because they influence their subordinates mainly through personal virtues and moral excellence.

Type 3 is low benevolence, high authority and low morality; they together are labeled

“Dictatorial”. Such leaders give scant attention to their subordinates’ needs. Therefore, they do not obtain identification and respect from subordinates since they rule primarily by ruthless use of positional authority without benevolence nor morality.

Type 4 is low benevolence, high authority, and high morality; and labeled as “Disciplinarian” because leaders with such characteristics tend to be strict, uphold high performance standards, and pay little attention to followers’ personal needs.

Type 5 is high benevolence, low authority, and low morality, and labeled together as “Indulgent”. Such leaders influence subordinates primarily by acting nicely, thereby induce gratitude and indebtedness on the part of subordinates.

Type 6 is high benevolence, low authority and high morality. This leader is labeled as selfless benefactor PL leader since such leader lead by winning subordinates’ respect and gratitude and rarely resort to positional authority.

Type 7 is characterized as high benevolence, high authority and low morality, and labeled as “Godfather”. Such leaders are self-serving leaders who lead through creating fear and gratitude and repayment in the minds of subordinates.

Type 8 is high benevolence, high authority and high morality. They are together labeled as “Authentic PL leaders” as they are closet to the idea type of PL leaders as conceptualized by Farh and Cheng (2000). These leaders inspire followers by all three types of psychological mechanism, such as fear, gratitude and repayment and identification and respect to them.

The researcher listed and depicted all means of the three outcome variables, team psychological safety, team empowerment, and team performance across the eight PL types, and labeled the mean score that higher than the mean of means of outcome variables as high level, the other as low level.

The results in Figure 5 showed that Type 6 “Selfless benefactor” and Type 8 “Authentic” have the highest team psychological safety (Type 6 “Selfless benefactor” PL leader is 5.2015; Type 8 “Authentic” PL leader is 5.2025) and Type 3 “Dictatorial” PL type and Type 1 “Laissez-faire” PL type are the most ineffective leader characters on team psychological safety (scored 4.48 and 4.59 respectively). The effects of PL types on team psychological safety increased (the increase is small) from Type 3 “Dictatorial” (4.48) to Type 1 “Laissez-faire” (4.59) that both were characterized low morality and low benevolence, from

Type 7 “Godfather” (4.89) to Type 5 “Indulgent” (4.93) that both were characterized low morality and high benevolence, and from Type 4 “Disciplinarian” (4.85) to Type 2 “Ideological” (4.94) that both were characterized high morality and low benevolence. From Type 8 “Authentic” (5.2025) to Type 6 “Selfless benefactor” (5.2015) both were characterized high morality and high benevolence, the effects was out of expectation and decreased slightly. Compared the effects of PL types on team psychological safety between Type 3 and Type 7, Type 1 and Type 5, Type 4 and Type 8, Type 2 and Type 6, we can found that the mean scores increased with the two types in each group have the same moral and the same authoritarian level. Similarly, comparison between Type 3 and Type 4, Type 1 and Type 2, Type 7 and Type 8, Type 5 and Type 6, also revealed the increase in effects on team psychological safety, with the two types in each group have the same benevolent and the same authoritarian level.

Comparison was made between Type 3, Type1, Type 7 and Type 5, and between Type 4, Type 2, Type 8 and Type 6, in each comparison the four types have the same morality level, and found that Type 5 scored the highest team psychological safety, and then Type 7, Type 1 and finally Type 3 when morality was characterized as low; while Type 6 and Type 8 scored similar and have the highest team psychological safety, and then Type 2, and finally Type 4 when morality was characterized as high. Similarly, Comparison was made between Type 3, Type 1, Type 4 and Type 2, and between Type 7, Type 5, Type 8 and Type 6, in each comparison the four types have the same benevolence level. We got the highest team psychological safety from Type 2, followed by Type 4, Type 1, and finally Type 3 when benevolence was characterized as low; while we got the highest team psychological safety from Type 8, which is similar to Type 6, and then followed by Type 5, and finally Type 7 when benevolence was characterized as high.



Figure 5. Effects of eight PL types on team psychological safety

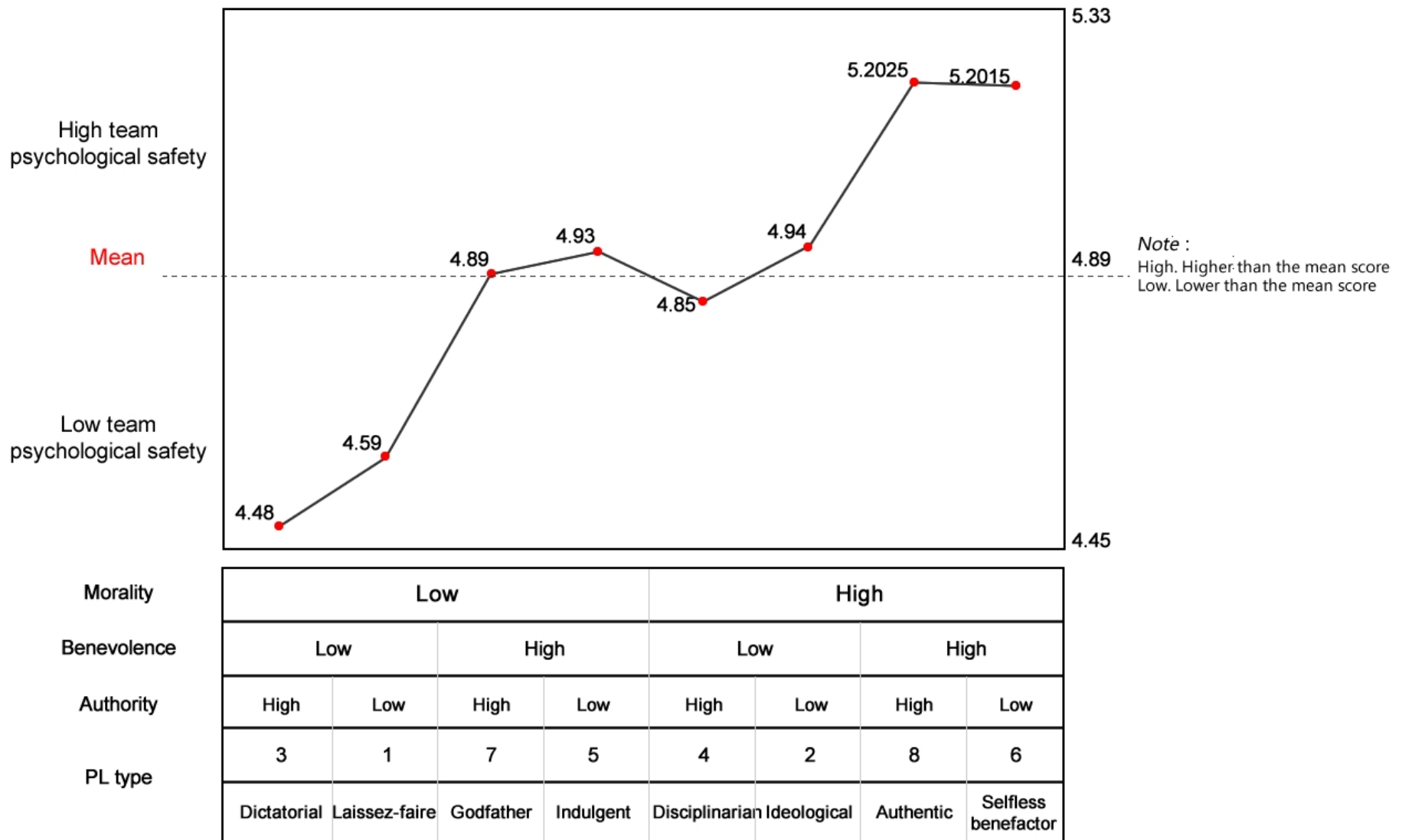
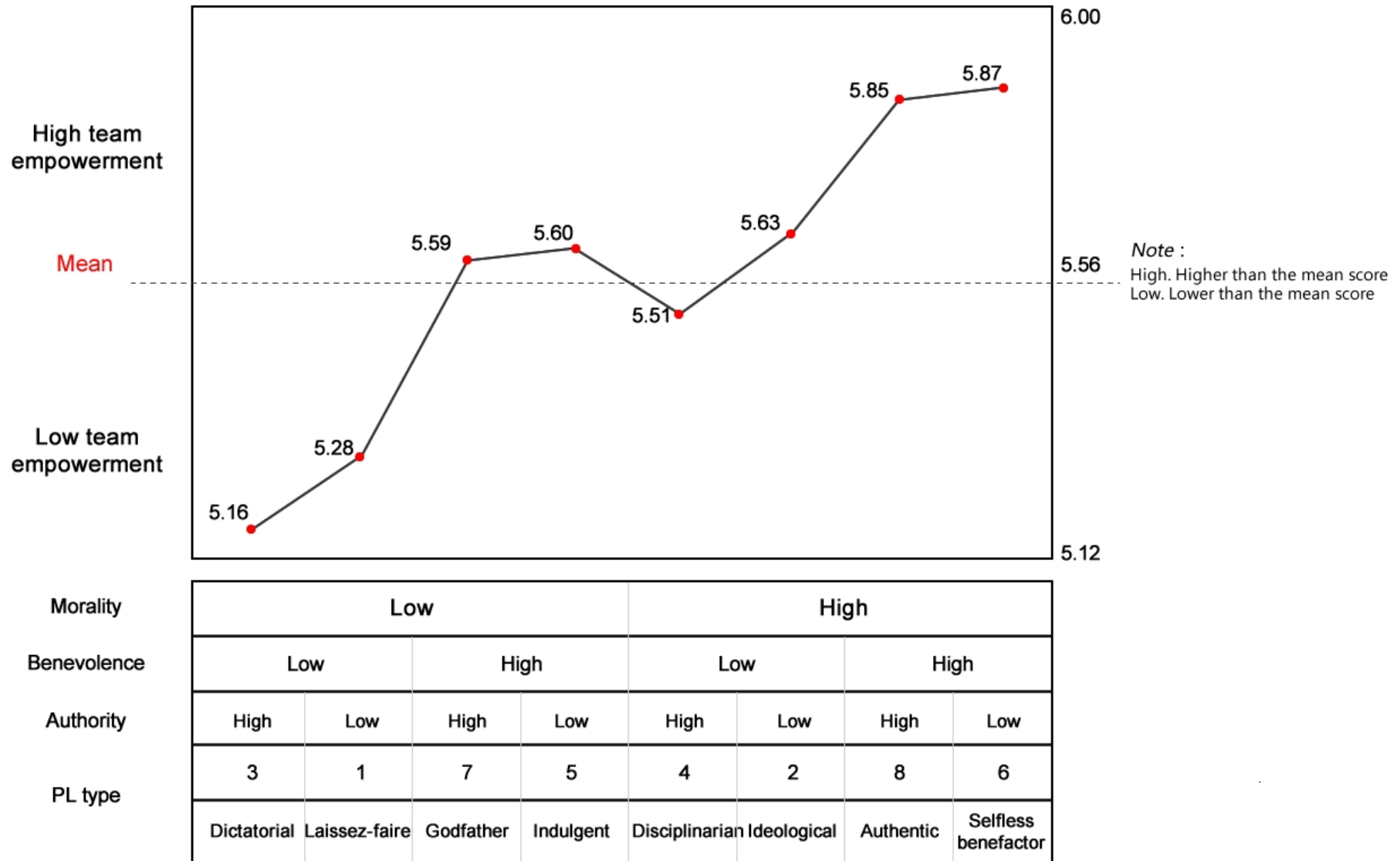


Figure 6 showed similar results as Figure 5 expect of the values at each point and the outcome variable which was team empowerment. Type 6 “Selfless benefactor” and Type 8 “Authentic” have the highest team empowerment (Type 6 “Selfless benefactor” PL leader is 5.87; Type 8 “Authentic” PL leader is 5.85) and Type 3 “Dictatorial” PL type and Type 1 “Laissez-faire” PL type were the most ineffective leader characters again on team empowerment (scored 5.16 and 5.28 respectively). The effects of PL types on team empowerment increased slightly from Type 3 “Dictatorial” (5.16) to Type 1 “Laissez-faire” (5.28) that both were characterized low morality and low benevolence, from Type 7 “Godfather” (5.59) to Type 5 “Indulgent” (5.60) that both were characterized low morality and high benevolence, from Type 4 “Disciplinarian” (5.51) to Type 2 “Ideological” (5.63) that both were characterized high morality and low benevolence, and from Type 8 “Authentic” (5.85) to Type 6 “Selfless benefactor” (5.2015) both were characterized high morality and high benevolence. Furthermore, compared the effects of PL types on team empowerment between Type 3 and Type 7, Type 1 and Type 5, Type 4 and Type 8, Type 2 and Type 6, we can found that the mean scores increased similar to that of team psychological safety. Comparison between Type 3 and Type 4, Type 1 and Type 2, Type 7 and Type 8, Type 5 and Type 6, also revealed the increase in effects on team empowerment. Comparison between Type 1 and Type 7 that with morality was both at low level, Type 2 and Type 8 that with morality was both at high level also showed increases in effects.

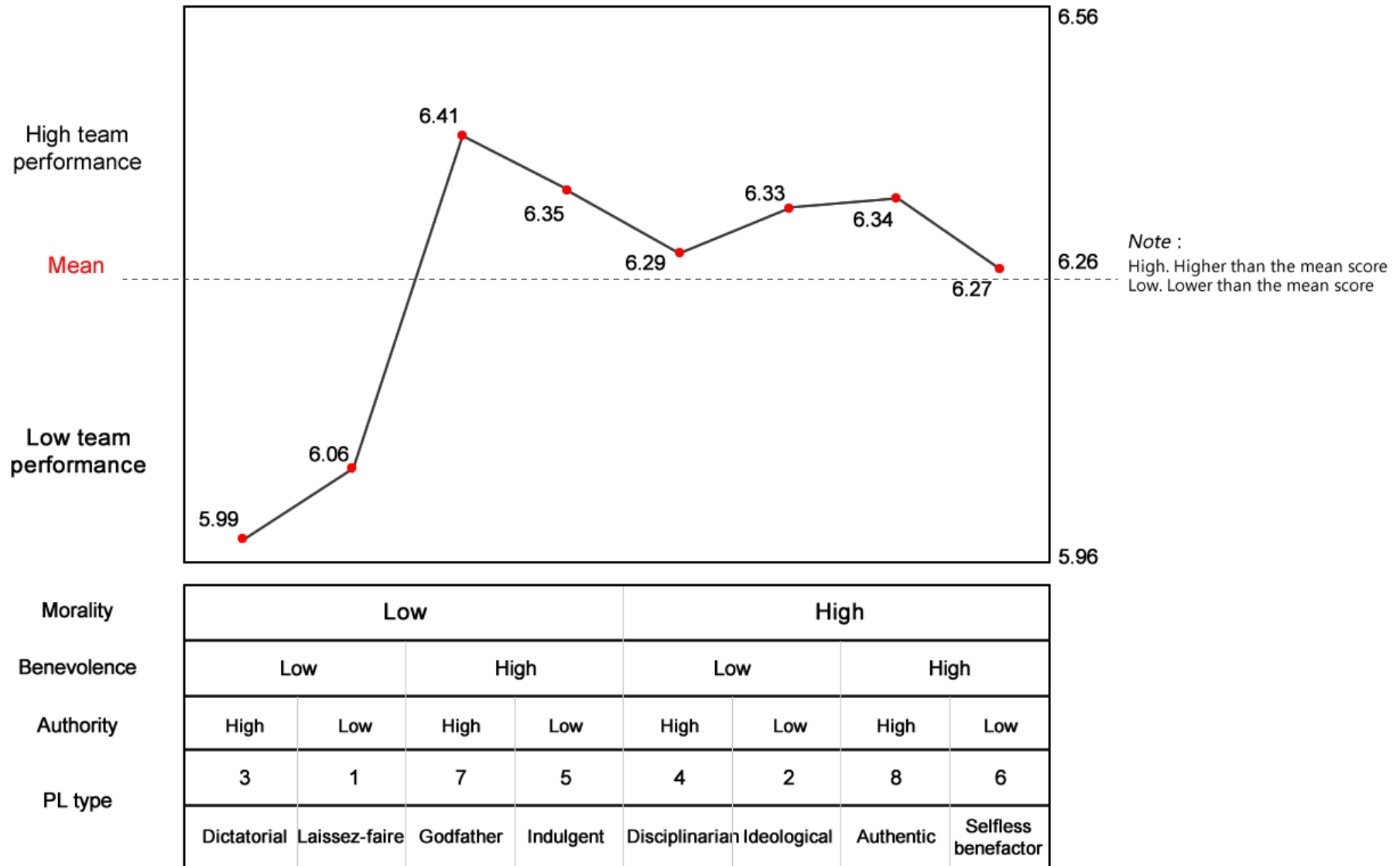
Comparison was made between Type 3, Type 1, Type 7 and Type 5, and between Type 4, Type 2, Type 8 and Type 6, in each comparison the four types have the same morality level, and found that Type 5 scored the highest team empowerment, and then Type 7, Type 1 and finally Type 3 when morality was characterized as low; while Type 6 scored obtained the highest team empowerment, and then Type 8, Type 2, and finally Type 4 when morality was characterized as high. Similarly, Comparison was made between Type 3, Type 1, Type 4 and Type 2, and between Type 7, Type 5, Type 8 and Type 6, in each comparison the four types have the same benevolence level. We got the highest team empowerment from Type 2, followed by Type 4, Type 1, and finally Type 3 when benevolence was characterized as low; while we got the highest team empowerment from Type 6, followed by Type 8, and then Type 5, and finally Type 7 when benevolence was characterized as high.

Figure 6. Effects of eight PL types on team empowerment



As shown in Figure 7, Type 3 “Dictatorial” and Type 1 “Laissez-faire” were the least effective PL types on team performance (scored 5.99 and 6.06 respectively). They were both characterized as low morality as well as low benevolence. Type 7 is “Godfather” which is characterized as high benevolence, high authority and low morality has the highest team performance score 6.41. However, Type 2 “Ideological”, Type 5 “Indulgent”, and Type 8 “Authentic” followed Type 7 tightly with scores on team performance were 6.33, 6.35, and 6.34 respectively. Then Type 4 “Disciplinarian” and Type 6 “selfless benefactor” followed with scores were 6.29 and 6.27 respectively. In general, expect of Type 1 and Type 3 had significantly lowest team performance values, there was no obvious trend between other PL types.

Figure 7. Effects of eight PL types on team performance



### 4.5.3 Additional analysis

The results found from the effects of PL types were interesting. The researcher also conducted an additional analysis that counted frequency of each PL type to examine the actual distribution of PL types in China teaching hospitals. As shown in the right part of Table 11 that Type 6 “Selfless benefactor” PL leader (35.81%) that characterized as high benevolence, low authority and high morality was the most prevalent in Chia teaching hospital, the next were Type 3 “Dictatorial” PL leader (27.70%) with low benevolence, high authority and low morality, following by Type 8 “Authentic” PL leader (15.88%) with all benevolence, authority and morality are high. The fourth is Type 1 “Laissez-faire” (8.78%) with low benevolence, low morality, and low morality. Other types of PL leader have similar frequency in this study. In the left part of Table 11, we listed the distribution of respondent's choice of ideal leaders among the eight types of PL leader from Niu’s study (2006), as well as actual distribution of leaders in school samples and private conglomerate samples from research of Cheng, Chou, and Farh (2000). In Farh et al.’s analysis on Cheng, Chou, and Farh’s data, they used the mid-point of absolute scale (3.5, as their scales used 6-point) as the cutoff to determine whether a leader was high or low on each PL dimension (Farh et al., 2008). In these three distributions, both Type 6 “Selfless benefactor” and Type 8 “Authentic” were among the most prevalent types.

Table 11. Distribution of ideal leader choices and actual eight PL types

Paternalistic leaders type		Distribution of actual leaders							
		Ideal leader choice		School principals		Managers in a private conglomerate		China teaching hospitals	
		Frequency	%	Frequency	%	Frequency	%	Frequency	%
1	Laissez-faire	0	0	16	3.19	19	3.93	26	8.78
2	Ideological	48	18.11	50	9.98	63	13.04	10	3.38
3	Dictatorial	2	0.75	20	3.99	27	5.59	82	27.7
4	Disciplinarian	15	5.66	28	5.59	40	8.28	7	2.36
5	Indulgent	1	0.38	29	5.79	4	0.83	10	3.38
6	Selfless benefactor	128	48.3	325	64.87	237	49.07	106	35.81
7	Godfather	2	0.75	1	0.2	6	1.24	8	2.7
8	Authentic	69	26.04	32	6.39	87	18.01	47	15.88
Total		265	100	501	100	483	100	296	100

*Sources:* Sample for Ideal leader choice distribution from Niu (2006); Sample for actual leader distribution from Schools and private conglomerate is from Cheng, Chou, and Farh (2000).





## Chapter V: Discussion and conclusion

Despite the fruitful work on paternalistic leadership conducted in China, we still know little about how it works on hospital department performance in China teaching hospitals whose characteristics are quite different from other enterprises and institutions. Therefore, the aim of the current research was to theorize and investigate the roles of team psychological safety and team empowerment in the link between paternalistic leadership and department performance in China teaching hospitals.

As hypothesized, in China teaching hospitals, benevolent leadership and moral leadership have impact on team empowerment through team psychological safety, and then, team empowerment mediated the relationship between team psychological safety and team performance. However, authoritarian leadership was not significantly related to team psychological safety at all.

These findings are intriguing that they show the prominence of team psychological safety and team empowerment in translating leader benevolence and morality into team performance in China teaching hospitals. Many studies have proposed that benevolence leadership and moral leadership have positive impact on psychological response on team and individual level, as well as performance outcome such as: organizational citizenship behavior, employees' in-role performance (Li et al., 2013) and team effectiveness (Chen, 2011). This study confirmed the hypothesized the positive effects of benevolent leadership and moral leadership especially in China teaching hospital settings with particular characteristics that are different from other organizations.

The explanation for the non-significant relationship between authoritarian leadership and team psychological safety may be complex. Previous research has shown that authoritarian leaders evoke team members' negative emotions and outcomes such as: fear, concern, anger (Farh & Cheng, 2000), team effectiveness (Chen, 2011). However, team psychological safety seems not be affected by authoritarianism. When I am not controlling for benevolent leadership and moral leadership, as expected, there was a significant negative relationship between authoritarian leadership and team psychological safety ( $\beta = -0.54$ ,  $p < 0.001$ ). Such findings lead to an interesting discussion. Authoritarian leadership does not necessarily undermine team members' psychological safety perception. When authoritarian leadership is perceived as well-intentioned (with benevolent leadership and moral leadership controlled), it may be not perceived as unsafe, give the hierarchical tradition in China that Chinese people respect authority associated with hierarchical positions, even though they experience negative

emotions under authoritarian leadership, their collective psychological safety level to the leader remains intact. This explanation obtained supports from an interview which also gave us other perspectives (shown as following) conducted to physicians included in my study.

*A physician said:*

*“My department leader often belittle to us, she never heard of us.....She definitely controlled many department resources and she seldom share her resources. But sometimes.....eh, yes.....only sometimes..... I feel our department is safe. We follow her instructions since she obtained the most professional training on this medical technology. We usually ignore her rudeness, ha.....and it is her advanced skills in this area that can help her fair decision on which department member should take more responsibility in front of errors. Even if she wants to protect the physicians she likes, she has to respect to the department rules in front of all department members and handles affairs fair. We are not afraid of taking risk.....Generally speaking, we can be fairly treated, and we are safe.”*

Meanwhile, from the qualitative interview, the researcher argued that other characteristic of team leader, contextual reason and psychological mechanism may also contribute to team psychological safety. This point further shed light on Farh et al.'s recommendation (Farh et al., 2008). PL model was originally introduced based on case studies of the management styles of owners/managers of overseas Chinese family business from the 1960s to the 1980s, the specific behaviors were “illustrative, not exhaustive” (Farh & Cheng, 2000). With rapid societal modernization, family businesses no longer play a dominant role in the Chinese society, and there has also been an accompanying change in social values. Those call for a re-examination of the construct domain of PL to render it compatible with the contemporary period (Farh et al., 2008). Team members' obedience and compliance toward leaders' behavior may be transferred from authoritarian leader behaviors to organizational rules and leaders' professional achievement. This point may be prominent in hospital setting that full of medical risks and medical science area that require physicians with advanced healthcare knowledge and team cooperation. Work following organizational rules and the professional instruction from leaders instead of being controlled by leaders' authoritarian behavior would be important for department members' cooperation without making big medical errors. Therefore, it is likely to build positive environment and psychological safety among department members without being afraid of taking interpersonal risks in dealing with medical issues. Such logic indicates the need to develop a new scale of paternalistic

leadership that leader's competency in professional area becomes an important elements, or revise the contents of authoritarian dimension. This point further shed light on Farh et al.'s recommendation (Farh et al., 2008).

Given the three seemingly conflicting components of paternalistic leadership, and elimination of the effect of authoritarian leadership on team psychological safety when controlling for benevolence and morality, we also conducted a configurational approach. Paternalistic leader was treated as a multidimensional phenomenon and using a configuration approach (Meyer et al., 1993) to analyze department leaders' relations to team psychological safety, as well the distribution of different types. The researcher used a mean split to derive 8 types of paternalistic leadership patterns, this splitting method is different from Farh, et al. (Farh et al., 2008) did. Following the labeling approaches, it is found that selfless benefactor leadership and authentic leadership are most effective on team psychological safety. Both of them are characterized as high benevolent leadership as well as high moral leadership. This finding is the same as that in Farh et al.'s analysis (2008) that those two types are the most effective in trust in supervisor and supervisory satisfaction. Dictatorial leadership and Laissez-faire leadership are the most ineffective on team psychological safety; and both are characterized as low benevolent leadership as well as low moral leadership. Similar results on effects of PL types have also been found in team empowerment. Such findings indicated that the necessary perception of high benevolent leadership and high moral leadership together to obtain the highest team psychological safety and team empowerment regardless of level of authoritarian leadership. On the other hand, the low morality and low benevolence tend to generate lowest team psychological safety and team empowerment regardless of level of authority. This low outcome is also true in team performance that laissez-faire leadership and dictatorial leadership created lowest team performance. The results are expected since both benevolence and morality are assumed to generate positive effects on those outcomes, when the team leader exhibits high personal integrity, unselfishness and act as an exemplar (high morality), their individualized care and concern to employees would be deemed true and sincerely, thus create the highest team climate of psychological safety and empowerment while the low morality and benevolence together created the lowest outcomes. It is not selfless benefactor leadership and authentic leadership created the highest team performance as they did on team psychological safety and team empowerment. This is reasonable since many factors contribute to high performance which is deemed as the farthest outcome.

The comparisons between Type 3 "Dictatorial" and Type 1 "Laissez-faire", Type 7 "Godfather" and Type 5 "Indulgent", Type 4 "Disciplinarian" and Type 2 "Ideological", and

Type 8 “Authentic” and Type 6 “Selfless benefactor” on effects of team psychological safety and team empowerment indicated that when controlled for morality and benevolence at the same time, authoritarian leadership tends to negatively affect team climates of psychological safety and empowerment, which means the higher authority, the lower team climate. Even though the effects of Type 8 “Authentic” and Type 6 “Selfless benefactor” on team psychological safety did not fit the conclusion well, it is not affect the conclusion seen from the scores. However, such conclusion on effect of authority may not be significant since the change in each comparison tend to be small. This is coincided with findings from structural equation model that when controlling for benevolent leadership and moral leadership, authoritarian leadership seems lose effects. Furthermore, comparisons between Type 3 and Type 7, Type 1 and Type 5, Type 4 and Type 8, Type 2 and Type 6 on team climate of psychological safety and empowerment suggested the absolute effect of benevolence in increasing those outcomes. Similar comparisons between Type 3 and Type 4, Type 1 and Type 2, Type 7 and Type 8, Type 5 and Type 6 indicated the absolute effects of morality in increasing team psychological safety as well as team empowerment. Those effects are also expected and confirmed by structure equation model. However, this configuration approach provides another point of view in exploring how the conceptually distinct characteristics of three dimensions of PL commonly occur together.

We also compared the effects of Type 3, Type 1, Type 5 and Type 7, Type 4, Type 2, Type 8 and Type 6 on team climate of psychological safety and empowerment respectively, and considered together and found that after controlling for morality, low authority together with high benevolence is more effective than high authority together with high benevolence, the latter is more effective than low authority together with low benevolence, then than high authority and low benevolence. Similarly, in comparison of the effects of Type 2, Type 4, Type 1 and Type 3, Type 6, Type 8, Type 5 and Type 7 respectively and considered together, we also found that after controlling for benevolence, high authority together with high morality is more effective than low authority together with low morality, then than high authority and low morality. In other words, high authority is not always the most ineffective, even though it is not the most effective. When the benevolence or morality is high, high authority combined with benevolence or morality creates much higher effects on team climate of psychological safety and empowerment than both benevolence or morality and authority are at low level. However, in which situation the high authority is needed cannot be obtained from this study and neither the main purpose for this study.

Furthermore, the researcher also examined the actual distribution of leaders across the eight

PL types in China teaching hospitals and compared with analyses results that Farh, et al. (2008) conducted. The distribution of actual department leaders in China teaching hospitals across the eight PL types has commons with distribution of samples from school and private conglomerate, but also has differences. For example, in all distributions, selfless benefactor leadership was the most prevalent. In addition, authentic leadership can also be classified as one of the most prevalent PL types. It is noted that both those types of PL leaders have high benevolent leadership as well as high moral character, regardless of the leader's authoritarian character. Those two types of PL leaders are also perceived favorable as Farh et al. (2008) stated. In this study, dictatorial PL type and laissez-faire PL type are the second and fourth prevalent leader character, which is quite different from previous research (Farh et al., 2008) that both PL types neither takes a huge account. There might be argues to such difference that this study did not utilized the same scales of PL to evaluate department leader behaviors, nor used the same split method as Niu (2006) and Farh et al. (2008) did to classify PL types, however, these points may not be supportable. The PL scale used in this study was developed from Farh and Cheng's scale (Farh & Cheng, 2000; Farh et al., 2008) and included all main elements of Farh and Cheng's scale. Farh and Cheng reanalyzed the data from Cheng, Chou, and Farh (Cheng et al., 2000) using the mid—point of the absolute scale (3.5) as the cutoff to determine whether a leader was high or low on each PL dimension. Their dichotomization was crude as admitted by them, and their results indicated a rough distribution on leadership across the eight PL types in private conglomerate and school samples. This study utilized the mean split approach, which is more accurate to reveal the actual distribution. Because the participants tend to give better evaluations on their department leaders in China and scores on each item have revealed in this study. Therefore, using the mean splitting method would not be a big issue but more acceptable.

To further explore the interesting differences in distributions of PL types in China teaching hospitals, the researcher compared the distribution with effect of PL types on team psychological safety, team empowerment, and team performance. It is interesting to find that the prevalent type Dictatorial PL (characterized as low benevolence, high authority, and low morality) and laissez-faire PL (characterized as characterized as low benevolence, low authority, and low morality) are the most ineffective PL type on those outcomes. The researcher argues that these findings revealed an actual phenomenon in China teaching hospitals that, a large proportion of department leaders are selected not for their talents in management, but for their individual professional competency and achievements which means they may be incompetent in managing a department. Thus, those department leaders

did not obtain excellent achievements on team psychological response nor team performance. Compared to laissez-fair leader character, dictatorial leader resorts to high authority over subordinates and make outcomes even worsen.

### **6.1 Theoretical and practical implications**

Corroborating study on psychological safety, empowerment and leadership on a team level, this study emphasizes the significance for leaders to build team psychological safety and team empowerment in an effort to positively affect team performance. However, it adds to this research stream several important theoretical and practical implications.

First, this study suggests that team psychological safety and team empowerment are sequential mediators for the relationship between paternalistic leadership and team performance in China teaching hospitals; this psychological mechanism has not yet been explored. Only limited research examined the psychological mechanism through which paternalistic leadership has influence on performance. Particularly, previous research analyzed the effects of PL at the dyadic level (Li et al., 2013), this study explored paternalistic leadership at the team level by collecting data with a large sample size. Furthermore, this research offers team psychological safety and team empowerment as powerful mechanism. In particular, it emphasizes the importance of team psychological safety and team empowerment in the leadership process in Chinese hospital culture and therefore encourages continued research on the roles of team psychological safety and team empowerment for leadership building.

Second, the research indicates that the three dimensions of paternalistic leadership do not create equal effects. Team psychological safety and team empowerment play important roles in influencing team performance, therefore, the benevolent and moral leader behaviors, which may elicit team psychological safety and team empowerment, are critical for leaders to exhibit. However, authoritarian leader behavior in this sample is not effective at eliciting team psychological safety and team empowerment. Furthermore, the results from PL types also confirmed the effects of three dimensions of PL, and give hints on the most effective types is high benevolence together with high morality while the most ineffective is both at low level. Therefore, it suggests that department leaders China teaching hospitals should emphasize benevolent and moral behaviors if they wish to obtain positive department performance. This study also provides evidences both qualitative and quantitative for further research on dimensionality of paternalistic leadership.

Third, by examining the distribution of PL types in this China teaching hospital sample and compare means of team psychological safety, team empowerment and team performance on each PL type, the researcher found the major types of PL existing in current China teaching hospitals and reflected the current situation that majority of department leaders are characterizes as low benevolence and low morality and failed to create high team psychological safety, team empowerment and team performance. This result suggests that top management teams of China teaching hospitals would benefit from selecting department leaders with management abilities rather than for example just professional competency.

Fourth, by investigate the mechanism of the relationship between paternalistic leadership and team performance; we add organizational and cultural perspective to team psychological safety and team empowerment. Only a few studies so far have explicitly examined team empowerment (Humborstad et al., 2008) in China. For example, in China with its high power-distance culture, individuals are accustomed to hierarchal structures and paternalistic leadership, hence, being empowered – taking the initiative or making decisions without consulting supervisors - may contradict Chinese norms and be difficult to implement (Humborstad et al., 2008). It is important to examine leadership styles that are prevalent in the culture under investigation and examine its cultural roots (Chen et al., 2011). Furthermore, the characteristics of China teaching hospitals and medical science illuminate the importance of examining team psychological safety in hospital-based study. In this article, we did so and showed that team psychological safety and team empowerment are important mechanism underlying the positive effects of benevolence and morality. However, authoritarian leader behavior may be the least useful leadership. Top hospital managements will benefit from training their department leaders on exerting control and buy-in from subordinates without the strict obedience and unquestioning respect since the rooted beliefs about effective leadership in people has been challenged (Chen et al., 2011). In addition, hiring and promotion criteria may also need to be adjusted to reflect the increased ambivalence associated with authoritarian leadership.

## **6.2 Limitations and future research**

There are the following methodological limitations. First, this study is cross-sectional design. Therefore, the causal ordering is subject to debate. For example, it is feasible to suggest that team psychological safety leads to them to view their leaders as paternalistic. This explanation is unlikely because the paternalistic leadership scale asks subordinates to rate the frequency of

specific leader behaviors (Chen et al., 2011). While team psychological safety may permeate subordinates' perceptions of paternalistic leadership, it is less likely to influence the frequency with which they observe their leaders exhibiting paternalistic behaviors (Chen et al., 2011). Longitudinal studies are needed to better illustrate the dynamics of these relationships.

Second, in this study, data on department leader behaviors, team psychological safety and team empowerment was collected from physicians, which has a risk of common method variance. The researcher attempted to minimize the problem by utilizing department leaders' ratings of team performance as the final dependent variable. Common method variance may not account for the differential finding that authoritarian leadership is not related with team psychological safety. Multiple sources for the measurement of variables are still needed in future study.

Third, this study was conducted in China teaching hospitals and considered the characteristics of hospital setting and medical science in designing the theoretical model; the generalizability of the findings to other institutions or cultural context is limited. Therefore, future research is needed in cultures that are outside the Chinese context but share similar characteristics in other organizations to examine the generalizability of the findings.

Finally, for the additional analysis on the distribution of PL types and their effects, we did not conducted significant test to examine whether the means of team psychological safety, team empowerment and team performance were significantly different across PL types due to it is not the main aim of this study nor the study has enough number of department units to put into analysis to identify the difference. Future research is needed to extend this research and give more powerful findings.

Paternalistic leadership traced to the Confucian ideology, which assumes that men occupy most if not all leadership roles. This introduced the question that to what extent female leaders are paternalistic. Gender of department leaders is not a main focus in this study; however, we believe that future research will benefit from theoretically investigating the potential effects of gender difference in the effects of paternalistic leadership. This may be also true for differences in tenure of working as department leaders.

Paternalistic leadership has been found and developed for decades (Farh & Cheng, 2000), and much can still be learned by examining this leadership in various contexts. Based on this study and results from previous study, authoritarian leadership is the most intriguing aspect of paternalistic leadership due to its roots in Chinese culture but seemingly conflict to other dimensions of PL and ambivalent effect on team psychological safety. Future research is needed to explore other mechanism underlying the effects of authoritarian leadership, in



which situation authority tends to be the most effective, and investigate the dimensionalities of paternalistic leadership.

### **6.3 Conclusion**

Paternalistic leadership is a newly developed leadership theory in the leadership literature. It roots in Confucian ideology, and was found effective in Asian culture. This study has extended the effects of paternalistic leadership on team level and illustrated that team psychological safety and team empowerment are important mechanism in explaining why benevolent and moral department leaders in China teaching hospitals get their department performance better. Furthermore, this study extended the effects of different types of paternalistic leadership on team climate of psychological safety and empowerment and team performance. There is much to be explored in the future; I hope these conclusions promote further research into the effects of paternalistic leadership and the impact of context within which it operated, as well as practice of paternalistic leadership at work.



## References

- Abramson, L. Y., Seligman, M. E. P., & Teasdale, J. D. (1978). Learned helplessness in humans: Critique and reformulation. *Journal of Abnormal Psychology*, 87, 49-74.
- Alderfer, C. P. (1987). An intergroup perspective on organizational behavior. In J. W. Lorsch (Ed.), *Handbook of organizational behavior* (pp. 190-222). Englewood Cliffs, NJ: Prentice-Hall.
- Amabile, T. M. (1983). *The social psychology of creativity*. New York: Springer.
- Ancona, D. G. (1990). Outward bound: strategies for team survival in the organization. *Academy of management journal*, 33, 334-365.
- Ancona, D. G., & Caldwell, D. F. (1992). Bridging the boundary: external activity and performance in organizational teams. *Administrative science quarterly*, 37, 634-655.
- Ansari, M. A., Ahmad, Z. A., & Aafaqi, R. (2004). Organizational leadership in the Malaysian context. In D. Tjosvold & K. Leung (Eds.), *Leading in high growth Asia: managing relationship for teamwork and change* (pp. 109-138). Singapore: World Scientific.
- Aryee, S., & Chen, Z. X. (2006). Leader-member exchange in a Chinese context: Antecedents, the mediating role of psychological empowerment and outcomes. *Journal of Business Research*, 59, 793-801.
- Ashford, S. J., Rothbard, N. P., Piderit, S. K., & Dutton, J. E. (1998). Out on a limb: The role of context and impression management in selling gender-equity issues. *Administrative Science Quarterly*, 43, 23-57.
- Ashforth, B. E. (1989). The experience of powerlessness in organizations. *Organizational Behavior and Human Decision Processes*, 43, 207-242.
- Ashkanasy, N. M., & Tse, B. . (2000). Transformational leadership as management of emotion. In N. M. Ashkanasy, C. E. J. Härtel & W. J. Zerbe (Eds.), *Emotions in the workplace: Research, theory, and practice* (pp. 221-235). Westport, CT: Quorum Book.
- Aycan, Z. (2006). Paternalism: Towards conceptual refinement and operationalization. In K. S. Yang, K. K. Hwang & U. Kim (Eds.), *Scientific advances in indigenous psychologies: Empirical, philosophical, and cultural contributions* (pp. 445-466). Cambridge: Cambridge University Press.
- Aycan, Z., Kanungo, R. N., Mendonca, M. Yu, K., Deller, J., Stahl, G., & Kurshid, A. (2000). Impact of culture on human resource management practices: A 10-country comparison. *Applied psychology: An international review*, 49, 192-221.
- Bandura, A. (1989). Human agency in social cognitive theory. *American Psychologist*, 44, 1175-1184.
- Boje, D. M., & Rosalie, G. A. (2001). Where's the power in empowerment? Answerd from Follett and Clegg. *Journal of applied behavioral science*, 37(1), 90-117.
- Bono, J. E., & Ilies, R. . (2006). Charisma, positive emotions, and mood contagion. *Leadership Quarterly*, 17, 317-334.
- Bowen, D. E., & Lawler, E. E. (1995). Empowering service employees. *Sloan Management Review*, 36(4), 73-85.
- Brancato, V. (2000). *The relationship of nursing faculties psychological empowerment and their use of empowering teaching behaviors*.
- Burpitt, W. J., & Bigoness, W. J. (1997). Leadership and innovation among teams: The impact of empowerment *Small Group Research*, 28, 414-423.
- Campion, M. A., Medsker, G. J., & Higgs, A. C. (1993). Relations between work group characteristics and effectiveness: Implications for designing effective work groups. *Personnel psychology*, 46, 823-855.
- Campion, M. A., Papper, E. M., & Medsker, G. J. (1996). Relations between work group

- characteristics and effectiveness: A replication and extension. *Personnel psychology*, 49, 429-452.
- Chen, C. C., & Farh, J. L. (2010). Developments in understanding Chinese leadership: paternalism and its elaborations, moderations, and alternatives. In M. H. Bond (Ed.), *The Oxford Handbook of Chinese Psychology* (pp. 599-622). Oxford: Oxford University Press.
- Chen, G., Kirkman, B. L., Kanfer, R., Allen, D., & Rosen, B. (2007). A multilevel study of leadership, empowerment, and performance in teams. *Journal of Applied Psychology*, 92, 331-346.
- Chen, G., & Klimoski, R. J. (2003). The impact of expectations on newcomer performance in teams as mediated by work characteristics, social exchanges, and empowerment. *ACAD Management J*, 46, 591-607.
- Chen, G. Q., Ning, N., Li, L., & Zhao, H. Q. (2009). Current status and futurr direction of research & practice in the field of organizationsl learning and learning organization in China. *Journal of Industry*, 6(5), 560-579.
- Chen, L. (2011). CEO paternalistic leadership and TMT efectiveness: The mediating role of team cohension. *Journal of Industry*.
- Chen, X. P., Eberly, M. B., Chiang, T. J., Farh, J. L., & Cheng, B. S. (2011). Affective trust in Chinese leaders: Linking paternalistic leadership to employee performance. *Journal of Management*, 10.
- Cheng, B. S. (1995a). *Authority values and executive leadership: The case of taiwanese family enterprises. Report prepared for Taiwan's National Science Council*. Taiwan: National Taiwan University.
- Cheng, B. S. (1995b). Chaxuegeju and Chinese organizational behavior. *Indigenous Psychological Research in Chinese Societies*, 3, 142-219.
- Cheng, B. S. (1995c). Paternalistic authority and leadership: A case study of a Taiwanese CEO. *Bulletin of the Institute of Ethnology Academic Sinica*, 79, 119-173.
- Cheng, B. S., Chou, L. F., & Farh, J. L. (2000). A trial model of paternalistic leadership: Constructs and measurement. *Indigenous Psychological Research in Chinese Societies*(14), 3-64.
- Cheng, B. S., Chou, L. F., Huang, M. P., Farh, J. L., & Peng, S. (2003). A trial model of paternalistic leadership: evidence from business organization in mainland China. *Indigenous Psychological Research in Chinese Societies*, 20, 209-252.
- Cheng, B. S., Chou, L. F., Wu, T. Y., Huang, M. P., & Farh, J. L. (2004). Paternalistic leadership and subordinate responses: Estabilishing a leadership model in Chinese organizations. *Asian Journal of Social Psychology*, 7, 89-117.
- Cheng, B. S., Huang, M. P., & Chou, L. F. (2002). Paternalistic leadership and its effectiveness: evidence from Chinese organizational teams. *Journal of psychology in Chinese societies*, 3, 85-112.
- Chua, R. Y. J., Ingram, P., & Morris, M. W. (2008). From the head and the heart: Locating cognition- and affect based trust in managers' professional network. *Academy of Management Journal*, 51, 436-452.
- Conger, J. A., & Kanungo, R. N. (1988). The empowerment process: Integrating theory and practice. *Academy of Management Review*, 12, 471-482.
- Corsun, D. L., & Enz, C. A. (1999). Predicting psychological empowerment among service workers: the effect of support-based relationships. *Human relations*, 52(2), 205-224.
- Cremer, D. D., Snyder, M., & Dewitte, S. (2001). "The less I trust, the less I contribute (or not)?" The effects of trust, accountability and self-monitoring in social dilemmas. *European Journal of Social Psychology*, 31(1), 93-107.
- Deci, E. L., & Ryan, R. M. (1985). *Intrinsic motivation and self-determination in human*

- behavior*. New York: Springer.
- Detert, J. R., & Edmondson, A. C. (2005). No exit, no voice: The third of risky voice opportunities in organizations. *Harvard Business School Working Paper*, 5-49.
- Edmondson, A. C. (1996). Learning from mistakes is easier said than done: Group and organizational influences on the detection and correction of human error. *Journal of Applied Behavior Science*, 32, 5-32.
- Edmondson, A. C. (1999a). Psychological safety and learning behavior in work teams. *Administrative Science Quarterly* June 44(2), 350-383.
- Edmondson, A. C. (1999b). A safe harbor: social psychological conditions enabling boundary spanning in work teams. *Research on managing groups and teams*, 2, 179-199.
- Edmondson, A. C. (1999c). *A psychological safety net: investigating organizational learning at the group level of analysis*. Working paper. Harvard Business School. Boston, MA.
- Edmondson, A. C. (2002). Managing the risk of learning: Psychological safety in work teams. In M. West (Ed.), *International Handbook of Organizational Teamwork*. London: Blackwell.
- Edmondson, A. C. (2003). Speaking up in operating room: How team leaders promote learn interdisciplinary action teams. *Journal of Management Studies*, 40, 1419-1452.
- Edmondson, A. C. (2004). Psychological safety, trust, and learning in organizations: a group-level lens. In R. Kramer & K. Cook (Eds.), *Trust and Distrust in Organizations: Dilemmas and Approaches* (pp. 239-272). New York: Russell Sage Foundation.
- Edmondson, A. C., Bohmer, R. M., & Pisano, G. P. (2001). Disrupted routines: team learning and new technology implementation in hospitals. *Administrative science quarterly*, 4(685-716).
- Edmondson, A. C., Roberto, M. A., & Watkins, M. D. (2003). A dynamic model of top management team effectiveness: Managing unstructured task streams. *Leadership Quarterly*, 219, 1-29.
- Farh, J. L., & Cheng, B. S. (2000). A cultural analysis of paternalistic leadership in Chinese organizations. In J. T. Li, A. S. Tsui & E. Weldon (Eds.), *Management and organizations in the Chinese context* (pp. 94-127). London: Macmillan.
- Farh, J. L., Cheng, B. S., Chou, L. F., & Chu, X. P. (2006). Authority and benevolence: Employees' responses to paternalistic leadership in China. In A. S. Tsui & L. Cheng (Eds.), *China's Domestic Private Firms: Multidisciplinary perspectives on management and performance* (pp. 230-260). New York: M. E. Sharpe.
- Farh, J. L., Liang, J., Chou, L. F., & Cheng, B. S. (2008). Paternalistic leadership in Chinese organizations: Research process and future research directions. In C. C. Chen & Y. T. Lee (Eds.), *Leadership and management in China* (pp. 171-205). Cambridge, New York: Cambridge University Press.
- Feldman, M., & Khademian, A. (2003). Empowerment and cascading vitality. In K. Cameron, J. Dutton & R. E. Quinn (Eds.), *Positive organizational scholarship* (pp. 343-358). San Francisco: Jossey-Bass.
- Ford, R. C., & Fottler, M. D. (1995). Empowerment: A matter of degree. *ACAD Management Executive*, 9(3), 21-31.
- Fried, Y., & Ferris, G. (1987). The validity of the job characteristics model. *Personnel psychology*, 40, 287-322.
- Geelmuyden, M., & Silvester, E. (1999). *Empowerment in Government Services in the U.K.*
- Gilson, C. B. (2001). From accumulation to accommodation: The chemistry of collective cognition in work groups. *Journal of Organizational Behavior*, 22, 121-134.
- Gomez, C., & Rosen, B. (2001). The leader-member exchange as a link between managerial trust and employee empowerment. *Group & Organization Management*, 26, 53-69.
- Guzzo, R. A., Yost, P. R., Campbell, R. J., & Shea, G. P. (1993). Potency in groups:

- Articulating a construct. *British Journal of Social Psychology*, 32, 87-106.
- Hackman, J. R. (1987). The design of work teams. In J. Lorsch (Ed.), *Handbook of organizational behavior* (pp. 315-342). Englewood Cliffs, NJ: Prentice-Hall.
- Hackman, J. R., Baker, J., Tjoscol, D., & IR., Andrews. (1987). Conflict approached of efective and ineffective managers: a field study in a matrix organization. *Journal of Management Studies*, 25(2), 167-178.
- Hackman, J. R., & Oldham, G. R. (1980). *Work redesign*. Reading MA: Addison-Wesley.
- Hofstede, G. (2001). *Culture's consequences: comparing values, behaviors, institutions, and organizations across nations*. Thousan Oaks, CA: Sage.
- Hotfall, S. E. (1989). Conservation of resources: A new attempt at conceptualizing stress. *American Psychologist*, 44(513-524).
- House, R. J., Hanges, P. J., Javidan, M., Dorfman, P. W., & Gupta, V. (2004). *Culture, leadership, and organizations: the GLOBE study of 62 societies*. Thousand Oaks, CA: Sage.
- Humborstad, S. I. W., Humborstad, B., Whitfield, R., & Perry, C. (2008). Implementation of empowerment in Chinese high power-distance organizations. *The international ournal of huamn resource management*, 19(7), 1349-1364.
- Hyatt, D. E., & Ruddy, T. M. (1997). An examination of the relationship betweenwork group characteristics and performance: Once more into the breech. *Personnel psychology*, 50, 553-585.
- James, L. R. (1982). Aggregation bias in estimates of perceptual agreement. *Journal of Applied Psychology*, 67, 219-229.
- James, L. R., Demaree, R. G., & Wolf, G. (1984). Estimating within-group interrater reliability with and without response bias. *Journal of applied psychology*, 69, 85-98.
- James, L. R., Demaree, R. G., & Wolf, G. (1993). An assessment of within-group interrater agreement. *Journal of applied psychology*, 78, 306-309.
- Jones, G. R., & George, J. M. (1998). The experience and evolution of trust: implications for cooperation and team work. *Academy of management review*, 23(3), 531-546.
- Joreskog, K. G., & Sorbom, D. (1989). *SPSS LISREL VII and PRELIS user's guide and reference*. Chicago, IL: SPSS.
- Kahn, W. A. (1990). Psychological conditions of personal engagement and disengagement at work. *ACAD Management J*, 33(4), 692-724.
- Kanfer, R. (1994). Work motivation: New directions in theory and research. In C. Cooper & I. T. Robertson (Eds.), *Key reviews in managerial psychology: Concepts and research for practice*. Oxford, England: Jogn Wiley & Sons.
- Kark, R., Shamir, B., & Chen, G. (2003). The two faces of transformational leadership: empowerment and dependency. *Journal of applied psychology*, 88(2), 246-255.
- Kirkman, B. L., & Rosen, B. (1997). A model of work team empowerment. In R. W. Woodman & W. A. Pasmore (Eds.), *Research in organizational change and development* (Vol. 10). Greenwich, CT: JAI press.
- Kirkman, B. L., & Rosen, B. (1999). Beyond self-management: The antecedents and consequences of team empowerment. *ACAD Management J*, 42, 58-74.
- Kirkman, B. L., & Rosen, B. (2000). Powering up teams. *Organizational Dynamics*, 28(3), 48-66.
- Kirkman, B. L., Rosen, B., Tesluk, P. E., & Gilson, C. B. (2004). The impact of team empowerment on virtual team performance: The moderating role of face-to-face interaction. *ACAD Management J*, 47(2), 175-192.
- Koberg, C. S., Boss, R. W., Senjem, J. C., & Goodman, E. A. (1999). Antecedents and outcomes of empowerment: Empirical evidence from the health care industry. *Group & Organization Management*, 24, 71-91.

- Kraimer, M. L., Seibert, S. E., & Liden, R. C. (1997). Psychological empowerment as a multidimensional construct: a test of construct validity. *Educational and psychological measurement*, 59, 127-142.
- Lawler, E. E. (1973). *Motivation in work organizations*. Monterey, CA: Brooks/Cole.
- Lawler, E. E., Mohrman, S. A., & Benson, G. (2001). *Organizing for high performance: Employee involvement, TQM, reengineering, and knowledge management in the Fortune 1000 companies*. San Francisco, CA: Jossey-Bass.
- Lee, F. (1997). When the going gets tough, do the tough ask for help? Help seeking and power motivation in organizations. *Organizational behavior and human decision processes*, 72(3), 336-363.
- Li, Y., Sun, J. M., & Jiao, H. T. (2013). Disintergration and integration: the research trend of paternalistic leadership. *Advance in psychological science*, 21(7), 1294-1306.
- Liden, R. C., Wayne, S. J., & Sparrowe, R. T. (2000). An examination of the mediating role of psychological empowerment on the relations between the job, interpersonal relationships, and work outcomes. *Journal of Applied Psychology*, 85(407-416).
- Lin, L. C. (2009). Team psychological empowerment as a mediator of the relationship between transformational leadership, team effectiveness and innovation: Moderating effect of team task interdependence. *Management of Engineering & Technology*, 2090-2098.
- Lord, R. G., & Maher, K. J. (1991). *Leadership and information processing: linking perceptions and performance*. Boston: Buwin Hyman.
- May, D. R., Gilson, R. L., & Harter, L. M. (2004). The psychological conditions of meaningfulness, safety and availability and the engagement of the huam spirit at work. *Journal of Occupational and Organizational Psychology*, 77(1), 11-37.
- Mayer, R. C., James, H. D., & Schoorman, F. D. (1995). An integrative model of organizational trust. *Academy of Management Review*, 20, 709-734.
- Meyer, A. D., Tsui, A. S., & Hinnings, C. R. (1993). Configurational approaches to organizational analysis. *Academy of management journal*, 36, 1175-1195.
- Milliken, F. J., Morrison, E. W., & Hewlin, P. F. (2003). An exploratory study of employee slience: Issues that employees don't communicate upward and why. *Journal of Management Studies*, 40, 1453-1476.
- Miranda, M. F. (1999). *Relationship of organizational culture, organization climate, and burnout to perceived empowerment among workers in a human service organization*.
- Mishra, K., Mishra, A., & Spreitzer, G. (1998). Preserving employee morale during downsizing. *Sloan Management Review*, 39(2), 83-95.
- Moingeon, B., & Edmondson, A. C. (1998). Trust and organisational learning. In N. Lazaric & E. Lorenz (Eds.), *Trust, learning and economic expectations*. London: Edward Elgar, Inc.
- Morris, T., & Pavett, C. M. (1992). Management style and productivity in two cultures. *Journal of International Bussiness Studies*, 23, 169-179.
- Morrison, E. W., & Phelp, C. C. (1991). Taking charge at work: Extrarole efforts to initiate workplace change. *ACAD Management J*, 42, 403-419.
- Ng, T. W. H., & Sorensen, K. L. (2008). Toward a further understanding of the relationship between perceptions of support and work attitudes: A meta-analysis. *Group & Organization Management*, 33, 243-268.
- Niu, C. P. (2006). *Paternalistic leadership and its effectiveness: a scenario-based analysis*. National Taiwan University.
- Noorderhaven, H. G. (1999). National culture and the development of trust: the need for more data and less theory. *Academy of management review*, 24, 9-10.
- O'Toole, J., & Lawler, E. E. (2006). *The new American workplace*. New York:

- Palgrave-Macmillan.
- Organ, D. W. (1988). *Organizational citizenship behavior: The good soldier syndrome*. Lexington, MA: Lexington Books.
- Pear, R. (1999). Report outlines medical errors in V.A. hospitals (pp. 1).
- Pellegrini, E. K., & Scandura, T. A. (2006). Leader-member exchange (LMX), paternalism and delegation in the Turkish business culture: an empirical investigation. *Journal of International Business Studies*, 37(2), 264-279.
- Pellegrini, E. K., & Scandura, T. A. (2008). Paternalistic leadership: a review and agenda for further research. *Journal of Management*, 34, 566-593.
- Pellegrini, E. K., Scandura, T. A., & Jayaraman, V. (2010). Cross-cultural generalizability of paternalistic leadership: An expansion of Leader-Member Exchange theory. *Group & Organization Management*, 35(4), 391-420.
- Prasad, A., & Eylon, D. (2001). Narrative past traditions of participation and inclusion: historic perspectives on workplace empowerment. *Journal of applied behavioral science*, 37(1), 5-14.
- Rappoport, A. (1997). The patient's search for safety: The organizing principle in psychotherapy. *Psychotherapy*, 34(3), 250-261.
- Redding, S. G. (1990). *The spirit of Chinese capitalism*. New York: Walter de Gruyter.
- Redding, S. G., Norman, A., & Schlander, A. (1994). The nature of individual attachment to theory: A review of East Asian variations. In H. C. Triandis, M. D. Dunnett & L. M. Hough (Eds.), *Handbook of industrial and organizational psychology* (Vol. IV, pp. 674-688). Palo Alto, CA: Consulting Psychological Press.
- Renn, R. W., & Vandenberg, R. J. (1995). The critical psychological states: An under-represented component in job characteristics model research. *Journal of Management*, 21, 279-304.
- Ryan, K. D., & Oestreich, D. K. (1991). *Driving fear out of the workplace: How to overcome the invisible barriers to quality, productivity, and innovation*. San Francisco: Jossey-Bass.
- Schein, E. (1985). *Organizational culture and leadership*. San Francisco: Jossey-Bass.
- Schein, E. H. (1996). Kurt Lewin's change theory in the field and in the classroom: notes toward a model of managed learning. *Systems practice* 9(1), 27-47.
- Schein, E. H., & Bennis, W. (1965). *Personal and organizational change via group methods*. New York: Wiley.
- Seibert, S. E., Silver, S. R., & Randolph, W. A. (2004). Taking empowerment to the next level: a multiple-level model of empowerment, performance, and satisfaction. *Academy of management journal*, 47(3), 332-349.
- Seibert, S. E., Wang, G., & Courtright, S. H. (2011). Antecedents and consequences of psychological and team empowerment in organizations: A meta-analytic review. *Journal of Applied Psychology*, 96(5), 981-1003.
- Silin, R. H. (1976). *Leadership and value: The organization of large-scale Taiwan enterprises*. Cambridge, MA: Harvard University Press.
- Sinha, J. A. (1990). *Work culture in Indian context*. New Delhi: Sage.
- Smith, J. A., & Foti, R. J. (1998). A pattern approach to the study of leader emergence. *Leadership quarterly*, 9, 147-161.
- Snyder, M. (1974). Self-monitoring of expressive behavior. *Journal of Personality and Social Psychology* 30(4), 526-537.
- Sparrowe, R. T. (1994). Empowerment in hospital industry: An exploration of antecedents and outcomes. *Harvard Business School Working Paper, Hospitality Research Journal*(17).
- Spreitzer, G. M. (1995). Psychological empowerment in the workplace: Dimensions,



- measurement, and validation. *ACAD Management J*, 38, 1442-1465.
- Spreitzer, G. M. (1996). Social structural characteristics of psychological empowerment. *ACAD Management J*, 39, 483-504.
- Spreitzer, G. M. (2007). Taking stock: A review of more than twenty years of research on empowerment at work. In C. Cooper & J. Barling (Eds.), *The Handbook of Organizational Behavior*: Sage Publications.
- Spreitzer, G. M., & Doneson, D. (2005). Musings on the past and future of employee empowerment. In T. Cummings (Ed.), *Handbook of organizational development*. Thousand Oaks: Sage.
- Spreitzer, G. M., Kizilos, M. A., & Nason, S. W. (1997). A dimensional analysis of the relationship between psychological empowerment and effectiveness, satisfaction, and strain. *Journal of Management*, 23, 679-704.
- Stogdill, R. M. (1974). *Hnadbook of leadership: a survey of theory and research*. New York: Free Press.
- Sullivan, D., Mitchell, M., & Uhi-Bien, M. (2003). The new conduct of business: how LMX can help capitalize on cultural diversity. In G. Graen (Ed.), *Dealing with diversity* (pp. 183-218). Greenwich, CT: Information Age Publishing.
- Swift, W., & Copeland, J. (1996). Treatment needs and experiences of Australian women with alcohol and drug problems. *Drug & Alcohol Dependence*, 40(3), 211-219.
- Taylor, S. E. (2007). *Foundations of health psychology*. New York: Oxford University Press.
- Tesluk, P. , & Zaccaro, S. J. (1997). Task and aggregation issues in the analysis and as-sessment of team performance. In M. Brannick & E. Sales (Eds.), *Assessment and measurement of team performance: Theory, research and applications* (pp. 197-224).
- Thoits, P. A. (1985). Social support process and psychological wellbeing: Theoretical possibilities. In I. G. Sarason & B. Sarason (Eds.), *Social support: Theory, research, and applications* (pp. 51-72). The Hague, the Netherlands: Nijhof.
- Thomas, K. W., & Velthouse, B. A. (1990). Cognitive elements of empowerment: An "interpretive" model of intrinsic task motivation. *ACAD Management Review*, 15, 666-681.
- Turnley, W. H., & Bolino, M. C. (2001). Achieving desired images while avoiding images: Exploring the role of self-monitoring in impression management. *Journal of Applied Psychology* 86(2), 351-360.
- Tyler, T. R., & Lind, E. A. (1992). A relational model of authority in groups. In Z. M. (Ed.), *Advances in Experimental Psychology*. New York: Academy.
- Uhl-Bien, M., & Graen, G. B. (1998). Individual self-managing activities in functional and cross-functional work teams. *Academy of management journal*, 41, 340-350.
- Waks, L. J. (1988). Design principles for labratory education in the creative process. *Person-centered review*, 3(4), 463-478.
- Wendt, R. F. (2001). *The paradox of empowerment: suspended power and the possibility of resistance*. Westport, CT: Praeger.
- West, M. A. (1990). The social psychology of innovation in groups. In M. A. West & e. a. Farr (Eds.), *Innovation and creativity at work: Psychological and organizational strategies* (pp. 309-333). Chichester, England UK: John Wiley & Sons.
- Westwood, R. I. (1997). Harmony and patriarchy: the cultural basis for 'paternalistic headship' among the overseas Chinese. *Organization Studies*, 18(3), 445-480.
- Yang, L. S. (1957). The concept of pao as a basis for social relations in China. In J. K. Fairbank (Ed.), *Chinese thought and institutions* (pp. 291-309). Chicago: University of Chicago Press.
- Yukl, G. (2010). *Leadership in organization*. Upper Saddle River, NJ: Prentice Hall.
- Zuger, A. (1999). The healing arts, cast in shades of gray (pp. 7).

- 陈璐, 井润田, & 杨百寅. (2010). 家长式领导、人际信任与高管团队有效性:一项本土化研究. *战略管理*, 2(2), 10-16.
- 陈璐, 杨百寅, 井润田, & 王国锋. (2010). 家长式领导、冲突与高管团队战略决策效果的关系研究. *南开管理评论*, 13(5), 4-11.
- 逢晓霞, 邹国庆, & 宋方熠. (2012). 家长式领导风格与高管团队行为整合的关系. *中国流通经济*, 26(5), 110-114.
- 鞠芳辉, & 万松钱. (2008). 家长型领导行为对民营企业绩效及员工态度的影响研究. *东北大学学报 (社会科学版)*, 10(4), 312-319.
- 于海波, 郑晓明, & 李永瑞. (2009). 家长式领导对组织学习的作用-基于家长式三元理论的观点. *管理学报*, 6(5), 664-670.
- 郑伯坝, 谢佩驾, & 周丽芳. (2002). 校长领导作风、上下级关系品质及教师角色外行为:转型式与家长式领导的效果. *本土心理学研究*(17), 105-161.
- 周浩, & 龙立荣. (2007). 家长式领导与组织公正感的关系. *心理学报*, 39(5), 909--991.
- 周浩, & 龙立荣. (2008). 上级家长式领导风格影响下属组织公正感的机制. *中大管理研究*, 3(3), 36-56.

## **Appendices**

### **Appendix 1: Cover Letter, English version**

Dear participants,

We are sincerely inviting you to take part in this study which aims to investigate the link between paternalistic behaviors of department leader and department performance as well as the mechanism behind it. It will spend you 7-10 minutes to fill in the questionnaire and please tick the items according to your real feeling. Thanks!

Your suggestion on this research will be appreciated. For any question related to this research, please contact with us by following information.

Chong Yat-Keung

Tel: 186-6461-2519

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**All data collected will be used only for this research. Findings and the final report will be based on statistical analysis. Any of your personal information will not be disclosed.**

## Appendix 2: Cover Letter, Chinese version

尊敬的研究参与者:

你好!

医院科室管理是当前医改形势下建立积极的医患关系、提升医院品牌和声誉的关键。希望通过本次研究能了解到科室家长式领导影响科室绩效的机制,探讨组织管理中遇到的问题。你所提供的信息将大大有助于我们的研究,因此,我们诚挚的邀请您的参加。为了保证研究结果的可靠性,希望你对所有问题进行认真和客观地回答,并在做出回答之前仔细阅读每个问题。整个问卷大约需时 7-10 分钟。

你若希望进一步了解研究的结果,或对本研究有任何疑问或建议,请与我们联系(联系方式如下所示)。

最后,再次对你的参与和帮助表示衷心的感谢!

联络方式:

地址: 北京 中国医院协会

姓名: 庄一强 副秘书长

邮编: 100013

电话: 010-84279277 / 186-6461-2519

Email: [Eric.chong@ailibi.com](mailto:Eric.chong@ailibi.com)

本研究收集的所有数据我们都会为你严格保密!!! 研究结果及最终报告将仅基于统计数据,绝不会泄露你的任何个人信息!!!

**Appendix 3: Paternalistic Leadership Scale, English version**

1. My supervisor devotes all his/her energy to taking care of department members. (Benevolence)
2. My supervisor takes good care of family members of department members as well. (Benevolence)
3. My supervisor will help us when we're in an emergency. (Benevolence)
4. My supervisor tries to understand what the cause is when members don not perform well. (Benevolence)
5. My supervisor will provide us chance for correcting mistakes. (Benevolence)
6. My supervisor will not embarrass subordinates in public. (Benevolence)
7. My supervisor never "passing the buck" in front of working problems. (Morality)
8. My supervisor does not use *guanxi* (personal relationship) or back-door practices to obtain illicit personal gains. (Morality)
9. My supervisor does not use his/her authority to seek special privileges for himself/herself. (Morality)
10. My supervisor acts as an exemplar in work and personal conduct. (Morality)
11. My supervisor asks us to obey his/her instructions completely. (Authority)
12. My supervisor will avenge us if we express objection in public. (Authority)
13. My supervisor determines all decisions in the department whether they are important or not. (Authority)
14. My supervisor always has the last say in the meeting. (Authority)
15. My supervisor never leaks his/her real thoughts to us. (Authority)
16. Our department members feel pressured when working with him/her. (Authority)
17. My supervisor scolds us when we cannot accomplish our tasks. (Authority)
18. We have to follow his/her rules to get things done. If not, he/she punishes us severely. (Authority)

**Appendix 4: Paternalistic Leadership Scale, Chinese version**

- 1 我们科主任经常会向科室成员嘘寒问暖。(仁慈)
- 2 我们科主任对科室成员的照顾会扩及其家人。(仁慈)
- 3 科室成员生活上有困难时,我们科主任会及时伸出援手。(仁慈)
- 4 当科室成员工作业绩不佳时,我们科主任会去了解真正的原因何在。(仁慈)
- 5 当科室成员工作出纰漏时,我们科主任会给予改正的机会。(仁慈)
- 6 我们科主任不会当着同事的面给人难堪。(仁慈)
- 7 当工作出问题,我们科主任不会把责任推得一干二净。(德行)
- 8 我们科主任不会因个人的利益去拉关系、走后门。(德行)
- 9 我们科主任为人正派,不会假公济私。(德行)
- 10 我们科主任是我们为人做事的好榜样。(德行)
- 11 我们科主任要求科室成员完全服从他/她的领导。(威权)
- 12 如果有科室成员当众反对我们科主任的意见时,会遭到他/她的冷言讽刺。(威权)
- 13 本科室大小事情都由科主任自己单独决定。(威权)
- 14 开会时,都按科主任的意见做最后的决定。(威权)
- 15 我们科主任从不把他/她的真实想法透露给科室成员。(威权)
- 16 与我们科主任一起工作时,科室成员感到他/她带给大家很大的压力。(威权)
- 17 当任务无法达成时,我们科主任会斥责科室成员。(威权)
- 18 我们科主任遵照原则办事,严厉处罚违反规定的行为。(威权)

**Appendix 5: Team Psychological Safety Scale, English version**

1. If a member makes a mistake on this team, it is often held against he/her (Reverse).
2. Members on this department are able to bring up problems and tough issues (Reverse).
3. Members on this department sometimes reject others for being different (Reverse).
4. It is safe to take a risk on this team, we are free to express and try even risky things.
5. It is easy to ask other members of this department for help.
6. No one on this team would deliberately act in a way that undermines other member's effort for his/her own interest.
7. Working with members of this team, my unique skills and talents are valued and utilized.

**Appendix 6: Team Psychological Safety Scale, Chinese version**

- 1 如果某位成员在工作时犯了错误，就会落下话柄。
- 2 科室成员总是能提出一些相互刁难的问题。
- 3 科室成员有时会排斥与自己不同的人。
- 4 在科室内部合作过程中,每个成员都感到自由，可以说自己想说的话(甚至是一些大胆的话)、尝试做自己想做的事(甚至是有些冒险的事)。
- 5 在科室内部合作过程中，每个人都很容易从其他成员那里得到帮助。
- 6 本科室没有人会为了表现个人的能力或优势而故意反对其他成员。
- 7 与科室成员一起工作，我的才能和潜力能得以发挥，受到肯定。



**Appendix 7: Team Empowerment Scale, English version**

1. My department has confidence in itself. (Potency)
2. My department can get a lot done when it works hard. (Potency)
3. My department believes that it can be very productive. (Potency)
4. My department believes that its work is significant. (Meaningfulness)
5. My department feels that its tasks are worthwhile. (Meaningfulness)
6. My department feels that its work is meaningful. (Meaningfulness)
7. My department can select creative ways to do the department's work. (Autonomy)
8. My department determines as a team how things are done. (Autonomy)
9. My department makes its own choices to do things without being told in the team. (Autonomy)
10. My department has a positive impact on this hospital's patients as well as their family members. (Impact)
11. My department performs tasks that matters to this hospital. (Impact)
12. My department makes a difference in this hospital. (Impact)

**Appendix 8: Team Empowerment Scale, Chinese version**

- 1 我们科室这个团队对自身很有信心。
- 2 我们科室只要大家一起努力，就会有很好的成效。
- 3 我们都认为我们科室的潜力是很大的。
- 4 我们科室这个团队一直认为自身工作是非常重要的。
- 5 我们科室能够感受到自身工作的价值。
- 6 我们都能感受到科室工作是非常有意义的。
- 7 我们科室这个团队能创造性地开展工作。
- 8 我们科室能够自主决定工作方面遇到的主要问题。
- 9 我们科室在上级领导不在或没有给予明示的情况下，也可以自己做出选择。
- 10 我们科室这个团队对病人和家属具有积极的影响。
- 11 我们科室所做的工作对于整个医院来说至关重要。
- 12 我们科室的工作在本院非常出色。

**Appendix 9: Department Performance Scale for Department Leaders, English version**

1. This department meets or exceeds customers' (inner and outer) expectations.
2. This department does superb work.
3. Critical quality errors never happened in our department.
4. Our department keeps getting better and better.

**Appendix 10: Department Performance Scale for Department Leaders, Chinese version**

- 1 本科室的工作达到（或超过）了院领导和病人的期望。
- 2 本科室的工作成绩出色。
- 3 本科室工作从没有出现大的失误。
- 4 本科室在不断发展进步。

**Appendix 11: Personal Demographic Data Survey Instrument for physicians, English version**

1. Age: \_\_\_\_\_; Gender: ☐ Male ☐ Female

Department: \_\_\_\_\_

2. How many years have you worked? \_\_\_\_\_

How long have you been working in his hospital? \_\_\_\_\_

3. Title: ☐ Highest senior ☐ Senior ☐ Intermediate title ☐ Junior or below

4. The Highest Diploma: ☐ Doctor's ☐ Master's ☐ Bachelor's ☐ Below bachelor's

**Appendix 12: Personal Demographic Data Survey Instrument for physicians, Chinese version**

1. 年龄: \_\_\_\_\_ (周岁); 性别: ☐ 男 ☐ 女;  
所在科室: \_\_\_\_\_
2. 你的工龄: \_\_\_\_\_ 年; 你在这个单位工作多久了? \_\_\_\_\_ 年
3. 职称: ☐ 正高级 ☐ 副高级 ☐ 中级 ☐ 初级及以下
4. 最高学历: ☐ 大专及以下 ☐ 本科 ☐ 硕士研究生 ☐ 博士研究生

**Appendix 13: Personal Demographic Data Survey Instrument for department leaders, English version**

1. Age: \_\_\_\_\_; Gender:   ☐ Male        ☐ Female

Department: \_\_\_\_\_

2. How many years have you worked? \_\_\_\_\_

How long have you been working in his hospital? \_\_\_\_\_

How long have you been working as department leaders? \_\_\_\_\_

3. Tile:   ☐ Highest senior     ☐ Senior     ☐ Intermediate title     ☐ Junior or below

4. The Highest Diploma:   ☐ Doctor's   ☐ Master's   ☐ Bachelor's   ☐ Below bachelor's

**Appendix 14: Personal Demographic Data Survey Instrument for department leaders, Chinese version**

1. 年龄：\_\_\_\_\_（周岁）； 性别： ☐ 男 ☐ 女；  
所在科室：\_\_\_\_\_
2. 你的工龄：\_\_\_\_\_年； 你在这个单位工作多久了？\_\_\_\_\_年  
你担任科主任多久了？\_\_\_\_\_年
3. 职称： ☐ 正高级 ☐ 副高级 ☐ 中级 ☐ 初级及以下
4. 最高学历： ☐ 大专及以下 ☐ 本科 ☐ 硕士研究生 ☐ 博士研究生