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## **Work Stress, Chinese Work Values, and Work Well-Being in the Greater China**

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### **Abstract**

*Work values influence our attitudes and behavior at work, but they have rarely been explored in the context of work stress. The aim of this research was thus to test direct and moderating effects of Chinese work values (CWV) on relationships between work stressors and work well-being among employees in the Greater China region. A self-administered survey was conducted to collect data from three major cities in the region, namely Beijing, Hong Kong, and Taipei (N = 380). Work stressors were negatively related to work well-being, whereas CWV were positively related to work well-being. In addition, CWV also demonstrated moderating effects in some of the stressor–job satisfaction relationships.*

### **Keywords**

*Chinese work values (CWV), moderators, work stressors, work well-being*

DECADES OF RESEARCH HAVE ESTABLISHED the fact that many stressors at work can lead to negative consequences for employees' well-being (e.g., Cooper, Dewe, & O'Driscoll, 2001; Kahn & Byosiore, 1992). According to the transactional model of stress (e.g., Lazarus & Folkman, 1984), the process of stress depends on the person's appraisal of the situation. As summarized by Cooper and colleagues (2001), three categories of individual differences variables have been linked to people's perceptions of work stressors: personality/dispositional, situational, and social support variables. Among them, personality/dispositional factors such as Type A behavior (Cooper, Sloan, & Williams, 1988), negative affectivity (Parkes, 1990), hardiness (Kobasa, Maddi, & Kahn, 1982), internal control (Spector, Sanchez, Siu, Salgado, & Ma, 2004), and self-efficacy (Lu, Siu, & Cooper, 2005) have received the greatest attention, while cultural and social variables such as attitudes and values are less explored (Chiu & Kosinski, 1995). As values influence our attitudes and behavior at work (Roe & Ester, 1999), they deserve more systematic examinations in the context of work stress. We thus focused on the role of Chinese work values affecting relationships between work stressors and work

well-being among Chinese employees from various sub-regions of the Greater China zone. We chose Beijing, Hong Kong, and Taipei as three target cities for several reasons. First, the three are important industrial cities in the Greater China region, representing mainland China (Beijing is the capital of the People's Republic of China, PRC), Hong Kong Special Administrative Region, and Taiwan (Taipei is the capital of the Republic of China, ROC). Second, although historical developments differ in the three sub-societies, recent empirical research revealed, somewhat contrary to common belief, that contemporary Chinese employees in mainland China, Hong Kong, and Taiwan had similar experiences of work stress (Lu, Kao, Zhou, & Siu, 2001; Lu, Cooper, Kao & Zhou, 2003; Kao, Lu & Lu, 2008) and endorsed similar levels of Chinese cultural values, such as collectivism, valuation of interpersonal relationships, and interdependence between the self and important others (Lu, Kao, Chang, Wu, & Zhang, 2008). Furthermore, Cheung and Chow (1999) reported more similarities than differences in work-related values across the three Chinese sub-societies. Huang and Chi (1998) also found that workers in mainland China and Taiwan were very similar in their importance rankings of both terminal work values and instrumental work values. We thus set out to explore whether work stressors and Chinese work values (those derived from the Chinese cultural tradition) would affect work well-being for all employees in the Greater China region.

### **Salient Work Stressors and Work Well-Being for Chinese Employees**

In a series of studies conducted in Taiwan, Lu (e.g., Chang, & Lu, 2007; Lu, 1997, 1999) found that heavy workload, lack of work autonomy, and interpersonal conflict are the most prevalent stressors for Taiwanese employees, and each was related to job dissatisfaction and psychological distress. Findings from a recent focused-group discussion study in Taiwan (Chang & Lu, 2007) further corroborated the above conclusion. Across the wider Greater China zone, comparative study found that heavy workload and interpersonal conflict are common work stressors for employees in mainland China, Hong Kong, and Taiwan, and again each was related to job dissatisfaction (Lu et al., 2001). It thus seems that heavy workload, lack of autonomy, and interpersonal conflict may be salient work stressors for all Chinese workers, which have detrimental effects on job satisfaction and associated psychological strain.

These three stressors fit well into the comprehensive “demand-control-support” work stress theory (Theorell, 2000), with heavy workload reflecting the quantitative demands, lack of work autonomy reflecting the dearth of perceived control, and interpersonal conflict reflecting the lack of support in the work environment. While these three stressors may be universal, interpersonal conflict at work has specific relevance to Chinese workers due to the heavy emphasis that Chinese culture places on harmonious relationships in social life, including work (Kwan, Bond, & Singelis, 1997). However, so far no study has compared the effects of this set of major work stressors in multiple Chinese samples from different sub-regions in the Greater China zone. In the present study, we thus attempted to replicate and extend previous findings to all Chinese workers, by examining these three stressors

simultaneously in Beijing, Hong Kong, and Taipei.

In the existing work stress research, job dissatisfaction, and tension/anxiety are most commonly studied, while other indicators of work well-being, such as behaviors, have largely been overlooked (Newton, 1989). We thus included multiple “outcomes” of psychological and behavioral nature as indicators of work well-being to better explore the range of effects work stressors might induce. Specifically, we measured job satisfaction, physical, and behavioral symptoms in the present study.

### **Direct and Moderating Effects of Chinese Work Values on Chinese Employees' Work Well-Being**

Chiu and Kosinski (1995) argued that the perception of work stress is influenced by cultural and social variables, such as values and attitudes. Previous occupational stress research has indeed found some evidence for both direct and moderating effects of work values. For instance, Lu and Lin (2002) showed that Taiwanese employees who endorsed higher work values, such as achievement, autonomy, and altruism, reported higher job satisfaction and lower turnover intention. In another study with Taiwanese workers, Lu (1999) demonstrated that intrinsic work values moderated relationships between stressors (heavy workload and lack of autonomy) and work well-being.

One possible theoretical reasoning for such beneficial effects of work values may be that employees who are high on certain work values, such as achievement, hard work, concern for others, and honesty, would focus more on the content of their jobs, thus they would be more intrinsically motivated and less affected by work stress (Hui, 1992; Lu, 1999). In the Chinese context, these values form the core of “Confucian work dynamism,” which is linked to the striking economic growth in the Greater China region (The Chinese Culture Connection, 1987). Specifically, work values such as collectivism (prioritizing group goals over personal interests), endurance (patience and persistence), hard work (thrift and steadiness), and *guanxi* (relation orientation, respecting social order and protecting others' face) will help to create dedicated, motivated, responsible individuals, with a strong sense of commitment and loyalty to institutions, such as work organizations (Kahn, 1979). Consequently, when stress mounts at work, those employees who possess stronger Chinese work values may have greater psychological resources to combat the detrimental impact of work stress, thus buffering the noxious effects of work stress. We further expect that these employees will enjoy more social support, as they are more relation-oriented and inclined to have more harmonious work relationships, which will generate more social resources for them to manage work stress. In addition, adherence to Chinese work values represents a congruence between individual and societal values, and fitting in with the larger social milieu itself was conducive to personal adjustment (Lu, 2006).

Our reasoning was also based on the theoretical perspective that views work values as a coping resource (Roe & Ester, 1999). Specifically, in keeping with the Confucian tradition, commitment to group goals and protecting harmonious social relationships (*guanxi*) are central features of Chinese collectivist values (Triandis, 1995) and pivotal to self-identity for Chinese people across the Taiwan Strait (Lu et al., 2008). In the work domain, such an emphasis on group loyalty results in strong

identification with the values and goals of the organization, devotion to the job, and willingness to serve the organization. In mainland China, “love your factory as your family” is a popular slogan of party propaganda, whereas in Taiwan, voluntarily working overtime for no compensation is a show of loyalty to the organization (Chang & Lu, 2007). Empirically, loyalty to the organization was found to promote job satisfaction, as well as buffer the noxious effects of work stress for Chinese employees in the Greater China region (Lu, Siu, & Lu, 2010), possibly because Chinese workers regarded the organization as an important “group.”

In empirical research, Huang, Eveleth, and Huo (1998) were the first to systematically delineate Chinese work values (CWV) as embedded in the Confucian tradition, and they found that collectivism, endurance, hard work, and *guanxi*, as defined above, could indeed predict work performance of workers in Taiwan and Hong Kong. Later, Siu, Lu, and Cheng (2003) also found that among employees in Hong Kong and mainland China, those who scored higher on CWV reported higher job satisfaction, but no moderating effects were found. Taken together, limited empirical evidence supports the direct beneficial effects of CWV for Chinese workers, but moderating effects have not yet been supported. In the present study we thus attempted to further test the possible moderating effects of CWV, including workers drawn from all the important subregions of the Greater China. We thus hypothesize:

Hypothesis 1: Chinese work values will be related to work well-being. Specifically, they will be positively related to job satisfaction but negatively related to physical and behavioral symptoms.

Hypothesis 2: Chinese work values will moderate the impact of work stressors on work well-being. Specifically, the negative effects of work stressors on job satisfaction and the positive effects on physical and behavioral symptoms will be greater when Chinese work values are low than when they are high.

To sum, in the present study we focused on both the direct and moderating effects of Chinese work values on work well-being for employees in the Greater China region, including mainland China, Hong Kong, and Taiwan. This sampling strategy would enable better generalizability of our findings to the Chinese populations. Furthermore, we focused on the three most important work stressors and four most relevant dimensions of the CWV to improve the internal validity of our study.

## **Method**

### **Procedure**

We used a self-administered structured questionnaire to collect data from employees in Beijing, Hong Kong, and Taipei. Respondents were invited to participate through personnel managers or contact persons known to the researchers in each organization. Questionnaires were distributed in booklet form, along with a cover-letter assuring anonymity and voluntary participation. Completed questionnaires were mailed back to the researchers directly. The overall response rate was 68.6% (Hong Kong: 37.5%, Beijing: 71.1%, Taipei: 97.3%).

## Samples

Demographic profiles of the three samples from Beijing ( $N = 128$ ), Hong Kong ( $N = 105$ ), and Taipei ( $N = 146$ ) are presented in Table 1. We conducted statistical analyses to see whether the three samples were similar in demographical background. Results showed that there were more males in the Taipei sample but more females in the Hong Kong sample ( $\chi^2 = 32.52$ ,  $df = 1$ ,  $p < .001$ ). There were also more managers in the Taipei sample ( $\chi^2 = 2.37$ ,  $df = 1$ ,  $p < .05$ ). The three samples were not different in age ( $F = 1.29$ ,  $df = 2,373$ ,  $ns$ ) and tenure ( $F = .19$ ,  $df = 2,375$ ,  $ns$ ). Overall, the three samples were compatible except for gender ratio, which will be controlled in further analysis along with other demographic variables.

**TABLE 1. Sample Characteristics**

	Beijing ( $N = 129$ )	Hong Kong ( $N = 105$ )	Taipei ( $N = 146$ )
<b>Sex</b>			
Male	46 (35.9%)	54 (51.9%)	102 (70.3%)
Female	82 (64.1%)	50 (48.1%)	43 (29.7%)
Unidentified	1	1	1
<b>Age (years)</b>			
Mean	35.78	35.64	36.25
<i>SD</i>	6.82	6.68	5.61
<b>Marital status</b>			
Married	91 (71.1%)	59 (56.7%)	104 (71.7%)
Single	37 (28.9%)	45 (43.3%)	41 (28.3%)
Unidentified	1	1	1
<b>Job tenure (years)</b>			
Mean	7.55	7.11	7.55
<i>SD</i>	7.44	6.43	7.54
<b>Rank</b>			
Manager	66 (51.2%)	69 (65.7%)	103 (70.5%)
Non-manager	63 (48.8%)	36 (34.3%)	43 (29.5%)

## Instruments

**Work stressors** We used existing Western scales to assess three stressors: workload (5 items; Spector & Jex, 1998, e.g., "How often is there a great deal to be done at work?"), interpersonal conflict (4 items; Spector & Jex, 1998, e.g., "How often are people rude to you at work?"), and lack of autonomy (3 items; Hackman & Oldham, 1975; e.g., "I decide on my own how to go about doing the work", reversed score). Each item was rated on a 6-point scale (1 = less than once per month or never, 6 = several times per day).

**Work well-being** Two scales were used to measure employees' work well-being: a) the Job Satisfaction Scale (3 items; Cammann, Fichman, Jenkins, & Klesh, 1979; e.g., "All in all, I am satisfied

with my job”) and b) the Psychological Well-being Scale of ASSET, an Organizational Screening Tool (Cartwright & Cooper, 2002), which assesses physical symptoms (10 items) and behavioral symptoms (10 items). These items represent symptoms of stress-induced mental ill health, such as panic attack, constant tiredness, and substance consumption. Each item was rated on a 6-point scale, with higher scores indicating higher job satisfaction and worse symptoms.

**Chinese work values** We used 8 items from the Chinese Work Values Scale (Huang et al., 1998) to measure four conceptual dimensions: collectivism, guanxi, hard work, and endurance. Each item was rated on a 6-point scale (1 = strongly disagree, 6 = strongly agree). However, with only two items representing each dimension, scale reliability would present a serious problem. We conducted an exploratory factor analysis on all eight items and found that only one factor could be extracted, accounting for 70.6% of total variance. We thus decided to use the aggregate score to represent CWV in further analyses.

The survey was conducted in Chinese. Measures for work stressors and work well-being were not originally derived for a Chinese sample. However, these standardized scales have been recently used in international comparative studies including multiple Chinese samples from the Greater China region, and have shown construct equivalence across a wide range of diverse cultures (Spector et al., 2004, 2007).

## Results

We conducted preliminary analyses to compare the three samples on main research variables using one-way ANOVAs. Table 2 presents the means, standard deviations, and internal consistency alpha coefficients of main variables. Scale reliabilities were acceptable. Employees in Hong Kong generally reported more stressors. However, as we expected, the level of CWV did not differ among the three samples.

Separate correlation analysis among main variables was conducted first in each of the three samples and revealed generally similar patterns, with a small number of correlations being significant in one sample but not in another (these data may be obtained from the first author). We thus repeated the analysis in the combined sample and report results in Table 3. All relationships between stressors and work well-being were significant and in the expected direction. Table 3 also shows that Chinese work values were related to all three indicators of work well-being. As for demographic variables, age, tenure, and rank had some correlations with work well-being. In general, older, senior workers, and managers reported better work well-being. However, sex was not related to work well-being, hence not included in further regression analysis.

TABLE 2. Descriptive Statistics of Main Variables for the Beijing, Hong Kong, and Taipei Sample

Variables	Beijing ( <i>N</i> = 129)			Hong Kong ( <i>N</i> = 105)			Taipei ( <i>N</i> = 146)			Post-hoc Scheffe test
	M	SD	$\alpha$	M	SD	$\alpha$	M	SD	$\alpha$	F(df)
WL	11.53	4.84	.89	15.26	6.72	.92	14.41	6.55	.94	12.56*** (2,369)
AUTO	8.45	3.10	.89	9.04	3.20	.75	7.26	3.06	.87	10.75*** (2,374)
IC	6.14	2.16	.70	8.96	4.22	.82	7.08	3.10	.78	22.84*** (2,375)
CWV	43.09	5.02	.75	41.71	6.95	.87	42.76	6.15	.77	1.54 (2,367)
JS	12.63	2.98	.82	11.79	3.47	.81	12.40	3.41	.82	1.95 (2,374)
PS	22.50	6.72	.82	26.42	8.52	.86	23.55	8.61	.88	7.27** (2,367)
BS	27.74	8.85	.92	32.02	9.24	.91	28.22	9.85	.92	7.08** (2,375)

Notes. WL = workload; AUTO = lack of autonomy; IC = interpersonal conflict; CWV = Chinese work values; JS = job satisfaction; PS = physical symptoms; BS = behavioral symptoms.

\*\*  $p < .01$ , \*\*\*  $p < .001$



TABLE 3. Intercorrelations Among Main Variables for the Combined Sample ( $N = 380$ )

Variables	1	2	3	4	5	6	7	8	9	10	11
1. WL	1.00										
2. AUTO	.13*	1.00									
3. IC	.52***	.18***	1.00								
4. CWV	-.06	-.19***	-.12*	1.00							
5. JS	-.13*	-.34***	-.20***	.23***	1.00						
6. PS	.27***	.13*	.29***	-.15**	-.17**	1.00					
7. BS	.34***	.15**	.34***	-.15**	-.23***	.66***	1.00				
8. Sex	-.01	.17**	-.04	-.17**	-.07	.07	.11	1.00			
9. Age	.00	-.15**	.05	.13*	.17**	.00	-.01	-.41***	1.00		
10. Tenure	-.04	-.04	-.03	.24***	.12*	-.12*	-.09	-.19***	.60***	1.00	
11. Rank	.07	-.11	.02	.17**	.20***	.00	-.06	-.31***	.48***	.21***	1.00

Notes WL = workload; AUTO = lack of autonomy; IC = interpersonal conflict; CWV = Chinese work values; JS = job satisfaction; PS = physical symptoms; BS = behavioral symptoms; Sex: 1 = M, 2 = F; Rank: 1 = manager, 0 = non-manager.

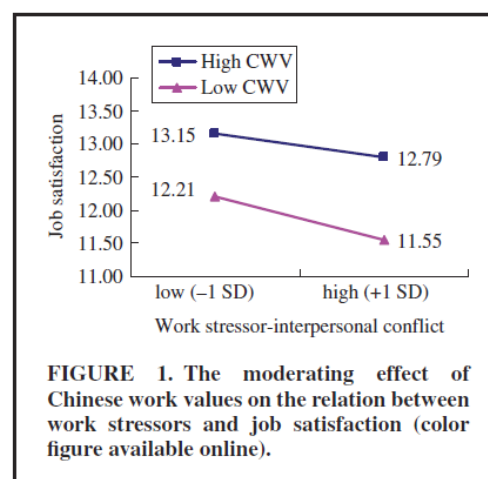
\*  $p < .05$ , \*\*  $p < .01$ , \*\*\*  $p < .001$

Given that there were differences in mean scores of stressors across the three Chinese societies, we further controlled these effects in correlations. To do so, we created two dummy variables to represent the three societies, and recomputed partial correlations controlling for “place.” However, the resulting partial correlations were almost the same as those reported in Table 3, in terms of magnitude, direction, and statistical significance. Thus, it seems that the three Chinese societies share similarity in relations among work stressors, CWV, and work well-being, further justifying our pooling of data for further analysis.

We then conducted a series of hierarchical regression analyses (Cohen, Cohen, West, & Aiken, 2003) to test the moderating effects of CWV on stressor–work well-being relationships while controlling for tenure and rank. As age had rather high correlations with tenure (see Table 3), it was excluded from regression to avoid the multi-collinearity problem. We conducted three steps to predict job satisfaction, physical, and behavioral symptoms separately, following procedures suggested by Cohen and colleagues (2003). Predictors were standardized, and interaction terms were then created from these standardized predictors. In the first step of regression, we entered demographic variables. Second, we entered work stressors (one for each regression) and CWV. Finally, we entered the interaction terms (work stressors  $\times$  CWV).

The results reported in Table 4 show that Chinese work values significantly moderated two out of three stressor–job satisfaction relationships, but did not moderate any of physical or behavioral symptoms relationships. The two significant interactions are plotted in Figure 1a and 1b. Post hoc slope tests revealed significant differences between the high and low CWV groups on the workload–job satisfaction relation ( $t = 3.01, p < .01$ ) and interpersonal conflict–job satisfaction relation ( $t = 1.97, p < .05$ ). Specifically, the workload–job satisfaction relationship is stronger (steeper regression line) for people with high CWV, while the interpersonal conflict–job satisfaction relationship is stronger for people with low CWV. Therefore, Hypothesis 2 was partially supported, though the small  $R^2$  changes suggested that the moderation effect was only slight.

In all the regression analyses, CWV showed a consistent direct (main) effect on job satisfaction, physical symptoms, and behavioral symptoms. All of these regression coefficients were significant. Therefore, Hypothesis 1 was supported.



**TABLE 4. Hierarchical Regression Analysis Predicting Job Satisfaction, Physical and Behavioral Symptoms for the Combined Sample ( $N = 380$ ) With Chinese Work Values as Moderator**

Step	Predictors	Job satisfaction		Physical symptoms		Behavioral symptoms	
		Standardized Beta	R <sup>2</sup> change	Standardized Beta	R <sup>2</sup> change	Standardized Beta	R <sup>2</sup> change
1	Tenure	.09		-.12**		-.09	
	Rank	.18***		.02		-.04	
2	WL	-.13**	.05***	.26***	.03**	.33***	.00
	CWV	.19***		-.12**		-.11*	.06**
3	WL × CWV	-.11*	.04***	.03	.05**	.01	.00
	R <sup>2</sup>	.10	.01*	.08	.00	.06	.00
	F (df)	8.31*** (5, 336)		8.41*** (5, 349)		6.45** (5, 343)	
2	IC	-.19***		.27***		.33***	
	CWV	.17**	.06***	-.11*	.07***	-.11*	.05**
3	IC × CWV	-.11*	.01*	.01	.00	.01	.00
	R <sup>2</sup>	.12		.10		.05	
	F (df)	9.81*** (5, 339)		8.53*** (5, 332)		5.96*** (5, 336)	
2	AUTO	-.30***		.11*		.12*	
	CWV	.14***	.07***	-.12**	.04**	-.11*	.03*
3	AUTO × CWV	.50***	.00	-.03	.00	.06	.00
	R <sup>2</sup>	.12		.07		.03	
	F (df)	9.17** (5, 327)		7.96** (5, 323)		4.01 (5, 340)	

*Notes.* WL = workload; AUTO = lack of autonomy; IC = interpersonal conflict; CWV = Chinese work values; Rank: 1 = manager, 0 = non-manager.

Beta and F are taken from the final equation.

\*  $p < .05$ , \*\*  $p < .01$ , \*\*\*  $p < .001$

## Discussion

The purpose of the present study was to test both direct and moderating effects of Chinese work values on stressor–work well-being relationships among employees in the Greater China. We found that CWV were consistently associated with work well-being. Specifically, Chinese work values such as hard work, endurance, collectivism, and guanxi, were positively related to job satisfaction and negatively related to both physical and behavioral symptoms. These findings were consistent with previous studies (e.g., Huang et al., 1998; Lu & Lin, 2002; Siu et al., 2003) but extends positive associations of CWV to work well-being indicators of physical and behavioral symptoms, while previous studies focused on job satisfaction and work performance. One more added value of the present study is that our pooled sample from three major cities (Taipei, Hong Kong, and Beijing) better represents Chinese employees in the greater China region, while previous studies covered only one or two sub-regions.

Our results also demonstrated the moderating effects of CWV on stressor–job satisfaction relationships (see Table 4, Figure 1a and 1b). People who possess high Chinese work values coupled with low workload/interpersonal conflict work conditions seem to have the highest job satisfaction. As moderating effects of work values are seldom tested and reported in the literature, our results suggest that Chinese work values may be an important individual difference factor in the work stress process, for the following reasons.

First, Chinese work values are derived from the Confucian value system that are still prevalent among contemporary Chinese employees (Chao, 1990; Hui, 1992; The Chinese Culture Connection, 1987). We indeed found that employees working in mainland China, Hong Kong, or Taiwan are not at all different in their endorsement of CWV pertaining to hard work, endurance, collectivism, and guanxi (see Table 2). Western scholars (e.g., Kahn, 1979; MacFarquhar, 1980; The Chinese Culture Connection, 1987) have asserted that these Confucian work values played a pivotal role in the economic take-off of countries in the so-called “Confucian circle,” mainly covering the Greater China region. Previous research also revealed that work values such as achievement and altruism helped Taiwanese employees to better adjust to their jobs (Lu & Lin, 2002). Earlier, Chao (1999) suggested that employees’ work-related Confucian values of loyalty and cohesion may motivate them to develop higher commitment and consequently lead to higher job satisfaction. In a recent qualitative study, Taiwanese employees reported that traditional values such as loyalty, paying-back, and group cohesion helped them to combat work stress (Chang & Lu, 2007). In a recent quantitative study, loyalty to the organization was found to promote job satisfaction, as well as buffer the noxious effects of work stress for Chinese employees in the Greater China region (Lu et al., 2010), possibly because organizations are important “groups” in the collectivist Chinese societies. Our current findings corroborate and compliment these previous results, underlining the importance of work values, especially those deeply rooted in the Chinese cultural tradition in enhancing work morale and job performance among Chinese employees, through loyalty pledged to organizations.

Second, the Chinese work values we focused on in the present study overlap with internal locus of control, self-efficacy, and resilience, which have all been found as effective stress buffers for the Chinese people (e.g., Lu et al., 2005; Lu et al., 2001; Lu, Kao, Cooper, & Spector, 2000; Siu et al., 2002). Internal locus of control is a generalized belief that personal actions are consistent with consequences. Self-efficacy refers to an individual's belief in his/her own effectiveness. Resilience is a construct connoting the maintenance of positive adaptation by individuals despite experiences of significant adversity. All of the three constructs are clearly related to the Chinese work values of hard work and endurance, as gauged in the present study. The Chinese cultural context of collectivism and *guanxi* may also re-shape the apparently individual-focused nature of internal control and self-efficacy into a social-oriented act, emphasizing role-playing and duty-fulfillment (Lu, 2008). Thus, using (cultural) values as higher abstracting constructs, Chinese work values as studied herein encompass the above known personal stress buffers, effective through the mechanism of hardworking and role obligation.

Third, in the collectivist and relation-oriented (*guanxi*) Chinese societies, accepting and respecting the social order is a strong imperative, which creates, nurtures, socializes, and constricts individuals to find their identity/position in the social world and diligently carry out the subscribed social obligations of this identity/position (The Chinese Culture Connection, 1987; Ho, 1991). In the work context, this traditional value now means that once a worker is employed by the company, he should be devoted to the job, work diligently, and take full responsibility for the job. In other words, such an emphasis on group loyalty and respecting the social order results in strong identification with the values and goals of the organization, devotion to the job, and willingness to maintain harmonious work relations. Accordingly, for the Chinese workforce, Confucian-based work values may help produce devoted and responsible workers, who will double their efforts particularly in time of heightened stress. Taking ownership of the problem, exerting more effort, and perseverance in the face of hardship are all key features of people with internal control, self-efficacy beliefs, and strong resilience. Therefore, Chinese work values can act as potential stress moderators for Chinese employees through the mechanism of devotion and effort exertion.

Readers should keep in mind that the present study has certain limitations. First, the survey design was cross-sectional, thus no causal conclusions are legitimate. Second, our survey was conducted using the self-report method. Self-assessed scales mainly tap individual subjective experiences, which reflect the reality an individual observes rather than the reality that actually exists (Podsakoff, MacKenzie, Lee, & Podsakoff, 2003). To overcome these methodological biases, Podsakoff and colleagues (2003) suggested that researchers should obtain multiple measures of the constructs from multiple sources using multiple methods. Future studies may thus consider employing both subjective and objective measurements of work stressors and work well-being, so that a full picture of all crucial variables and their interactions in the workplace can be better understood.

Further, we only surveyed employees in three major cities, we cannot generalize our findings to people in other areas of the Greater China region. There is a significant difference in response rates

from the three regions too. The low response rate in Hong Kong may be attributed to the particular sampling method used. The researcher in Hong Kong randomly selected companies from the official register to send questionnaires requesting participation, while researchers in Beijing and Taipei solicited personal acquaintances to help coordinate distribution and retrieval of questionnaires. Self-selection bias may thus be present, although any regional differences were statistically controlled post hoc. Finally, the sample sizes were not large enough for providing sufficient statistical power to warrant analyses separately for the Beijing, Hong Kong, and Taipei sample. Nonetheless, the protective effects of Chinese work values on work well-being against work stress has been demonstrated among employees in the Greater China region.

In sum, the current study systematically explored the influence of Chinese work values on various aspects of well-being at work. In the area of work stress research, compared to the abundant studies on personal variables as individual difference factors, social and cultural variables such as work values are seldom examined. Although there have been previous works on universal work values, our cross-cultural perspective is unique and distinctly Chinese. Our findings of both protective main effects and stress-moderating effects of the Chinese work values for Chinese employees in three distinct Chinese societies provide a unique contribution to the work stress literature in particular and the cultural psychological study in general. As we have demonstrated in this study, Chinese work values as rooted in the Chinese Confucian tradition may be an important stress moderator largely overlooked in the current work stress research. We speculated mechanisms for this moderation effect through workers' enhanced loyalty to the organization, hardworking and diligent role playing, and persistence and efforts exertion. Testing and refining these mechanisms can enrich work stress theories by involving processes related to social identification (to account for loyalty formation), social obligation (to account for role definition and role playing), and psychological resilience (to account for active coping). These will be promising directions for future research. The concluding message is that "culture" should be unpackaged, examined, and incorporated in our quest for better work adjustment and more effective managerial practices.

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