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The Effects of Contextual and Individual-Level Factors on Chinese Adults' Attitudes Toward Social Environments

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Abstract: *Using data from the nationally representative China Family Panel Studies (CFPS), we describe Chinese adults' attitudes toward three specific aspects of social environments: local government performance, severity of major social issues, and social trust. We further explore how county-level contextual factors and personal experiences relate to subjective social environments, while controlling for individual demographics. On average, Chinese adults in the CFPS endorsed moderately positive ratings for their local governments, but perceived high severities in various social issues, ranking economic inequality as the most severe. A moderate level of generalized trust was found, together with very high trust in parents and very low trust in Americans and strangers. Further analyses revealed that variations in subjective social environments at the prefectural level were relatively small compared with individual-level variations. At the individual level, personal experiences such as perceived unfair treatment showed consistently negative effects on how people evaluated their social environments. At the contextual level, employment rates appeared more influential than other studied factors. Regional economic inequality, as indicated by prefectural Gini, was not associated with most outcomes we studied.*

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Social environment is a complex construct that encompasses the physical, social, and cultural aspects of a society (Barnett and Casper 2001). It has been shown to have a significant impact on individual behaviors and health outcomes (van Wormer and Besthorn 2010; Wilkinson and Marmot 2003). Subjective evaluation of social environments by the general public is relatively new in China, but is gaining popularity, especially in the midst of booming online social media (He 2009; Shen 2009). Many local governments have adopted public evaluations to augment the dominant self-appraisal system (Wang 2007). Based on a nationally representative survey, this article describes how Chinese adults perceive three aspects of their social environments: local government performance, severity of major social issues, and social trust. We further explore how both contextual factors and personal experiences may relate to subjective evaluations of social environments.

Background

The Importance of Contextual Factors

How people perceive their social environments is naturally affected by the objective features of those environments. Research has provided empirical support for the idea that contextual factors (e.g., regional economic conditions) affect social trust and public evaluation of government officials, among other things (Duch and Stevenson 2006; Revelli 2010; Uslaner and Brown 2005).

Economic inequality is one specific contextual factor that has been studied in terms of its effect on subjective social environments, including social cohesion and trust (Kawachi et al. 1997; Tsai, Laczko, and Bjørnskov 2011). In general, higher degrees of economic inequality are associated with lower levels of social trust. For example, a study using state-level data in the United States found that general social trust was lower in states with higher levels of economic inequality and that economic inequality was the most important determinant of social trust (Uslaner and Brown 2005). The authors further explained that trust builds upon a psychological foundation of optimism and control, and people are less likely to believe in a bright future in the presence of high economic inequality. In addition, a high degree of inequality often parallels underinvestment in human capital, causing people to feel frustrated and have health problems (Kaplan et al. 1996; Kawachi et al. 1997). Researchers using data from China reported a negative effect of local income inequality on individual life satisfaction (Wu and Li 2013), but no such evidence is available on the subjective social environment based on Chinese national samples.

Despite empirical evidence supporting a negative effect of economic inequality on subjective social environments, studies based on Chinese samples indicate that the Chinese have a surprisingly high tolerance for inequality (Wu 2009). Furthermore, many Chinese consider economic growth a driving force for increasing inequality (Xie et al. 2012). There are two possible reasons for the high tolerance for inequality among the Chinese. First, Chinese adults perceive great opportunities for

social mobility despite economic inequality; second, a core belief among Chinese is that talent, education, and hard work are the key routes to economic success, and thus inequality is somewhat justified (Wu 2009). Under these circumstances, the detrimental effect of economic inequality on the subjective social environment in China may be smaller than in Western populations.

Unemployment is another contextual factor that has been shown to have a significant negative impact on subjective social environments. For example, Hansen (1999), after studying survey data from eight U.S. states from 1967 to 1997, concluded that state unemployment rates have a significant impact on governors' job performance evaluations, even with controls for national economic trends and political factors. Other researchers also found that state unemployment rates had a larger impact on the popularity of governors than other factors, including state-level inflation and per capita income tax (Niemi, Bremer, and Heel 1999).

Personal Experience

In addition to environmental characteristics, individuals' personal experiences may also significantly influence how they view their social environments (Lind, Kray, and Thompson 1998). The negative effect of perceived unfair treatment has been extensively studied in organizational research (Cohen-Charash and Mueller 2007; Rutte and Messick 1995), and such an effect has also been observed with physical and mental health (Robbins, Ford, and Tetrick 2012).

Research linking perceived unfairness to social attitudes is limited. A study in the United States in the 1980s reported that perceived fairness had a larger influence on endorsement of political leaders than did outcome-related concerns (Tyler, Rasinski, and McGraw 1985). Empirical studies in China revealed that personal encounters with local government officials may have a huge impact on how ordinary people evaluate their local governments (Ning 2010). Li and Chen (2008) interviewed 1,600 respondents living in rural areas from twenty-six provinces and found, while controlling for a number of other factors, that the efficacy of local governments in providing rural residents with solutions to problems had an appreciable impact on local government ratings.

Study Objectives

The objective of the current study is twofold. The first is to provide simple descriptive profiles of Chinese adults' subjective evaluation of three aspects of their social environments: local government performance, severity of major social issues, and social trust. The second objective is to analyze how contextual and individual-level factors are associated with evaluations of social environments. We are particularly interested in the contributions of perceived unfairness at the individual level and economic inequality and employment rates at the prefectural level.

Data and Methods

Data are from the nationally representative China Family Panel Studies (CFPS) (see the article by Xie and Hu in this issue, pp. 4–29). The CFPS is a longitudinal survey that follows all members of sampled families every two years and collects data on the socioeconomic, demographic, educational, and health aspects at the community, family, and individual levels. It was initiated in 2010, and was the first survey of its kind in China. A multistage probability sampling design was adopted, in which counties were the primary sampling units; communities were then sampled within counties, and families were selected within communities. Its baseline survey collected information on more than 40,000 individuals from 14,960 families and 634 communities in China. In this study, we analyzed data from the second wave of the CFPS, conducted in 2012.

Outcome Variables

Local Government Performance Rating. Respondents were asked "How would you rate the performance of the county/district government last year?" The following five options were offered: good achievement, some achievement, not much achievement, no achievement, and worse than before. We coded the data from 1 to 5, with higher values indicating more positive ratings.

Perceived Severity of Major Social Issues. CFPS 2012 listed eight major social issues and asked respondents to rate their severity on a scale of 0 to 10, with higher scores indicating higher levels of severity. The eight issues were corruption, the environment, economic inequality, employment, education, health care, housing, and social security.

Social Trust. Trust was measured with both a single item on generalized trust and a six-item scale on specific trust in six types of people. Generalized trust was measured by asking respondents "Generally speaking, would you say that most people can be trusted or that you can't be too careful in dealing with people?" In terms of specific trust, the CFPS asked respondents to rate the level of trust on a scale of 0 to 10 for the following six types of people: parents, neighbors, Americans, strangers, cadres, and doctors.

County/District-Level Factors

Gini Coefficient

A Gini coefficient was computed for each sampled county or district based on the 2005 minicensus conducted by the National Statistics Bureau in China. The statistics were computed at the district level if the individual lived in a metropolitan city with multiple administrative districts. Otherwise, the statistics were computed at the county level.

The 2005 mini-census was conducted on 1 percent of the total Chinese population and included all individuals residing in the sampled communities on October 31, 2005, as well as those who had a resident permit in the sampled community but were not present on the night of October 31, 2005. The computation of the Gini coefficient restricted the analytical sample to individuals who were at least sixteen years old, employed for at least thirty-five hours a week, and reported a positive monthly income.

Employment Rates, Gross Domestic Product Per Capita

Both measures were computed at the county or district level based on published figures from the 2010 census. Employment rates were computed as the percentage of people who were employed over the total population ages sixteen and above. Gross domesitic product (GDP) per capita was based on statistics from the 2010 census.

Individual-Level Factors

Perceived Unfair Treatment

CFPS 2012 asked respondents whether they had experienced any of the following: being treated unjustly due to the gap between rich and poor, being treated unjustly due to household registration, being treated unjustly due to gender, being treated unjustly by government officials, having conflict with government officials, unreasonable delays and stalling when going to government offices for business, or being overcharged when going to government offices for business. A composite score was formed by counting the total number of types of unfair treatment perceived by the respondents.

Working at Government Organizations

This is considered almost a privilege in China, as better social benefits are often provided for people working for government organizations. Research already shows that families with members working for government organizations had significantly higher income per capita than other families (Xie et al. 2013). We considered an individual to be working for a government organization if the person listed any of the following categories as his/her work unit: government/party/people's organization or military, state-owned or collectively owned public institution or research institute, state-owned or state-controlled enterprise.

Migrant Status

We considered an individual a migrant if his/her place of self-reported urban resident permit status (*hukou*) was outside the county or district he or she was residing in.

Other Demographic Variables

We further controlled for a number of key demographic variables, including age in years, gender (male = 1, female = 0), years of education, individual annual income in tertiles, and *hukou* (urban = 1, rural = 0). Age, gender, education, and *hukou* status were largely self-reported. When self-reported data were missing, however, we pulled additional information from family surveys.

Analytical Method

To study the effects of contextual and individual factors on subjective social environments and conform to the multistage sampling scheme used in the CFPS, we conducted a two-level analysis, with individuals nested within counties or districts. This type of analysis is also convenient for examining the possible contributions of contextual factors at the county or district level. For each outcome, we calculated the intraclass correlation (ICC) in an unconditional model without any covariates to evaluate the variation of the outcome at the county/district level. The ICC is a measure of how individuals are clustered within certain groups. ICC ranges from zero to one, with higher values indicating stronger clustering effects. In the current case, it would reflect how individuals were similar to one another within counties or districts.

A two-step modeling approach was adopted. Our first step was to evaluate the observed effect of each predictor by including one predictor at a time in the model. The second step was to simultaneously control for all predictors and evaluate their adjusted effects. All three contextual-level factors were categorized into tertile scores for easier interpretation.

Results

Sample Characteristics

A total of 105 counties/districts were in our initial data. We dropped five counties/distrists where we had fewer than ten observations within each county/district at the time of the 2012 data collection. A total of 19,728 individuals from 100 counties/districts were in our analytical sample. Descriptive statistics from Table 1 show that the counties/districts were heterogeneous in terms of general levels of economic development and inequality. The full sample had slightly more females than males and their average age was 45.427 (SD = 16.705). Average years of education were 6.515 (SD = 4.854), and 27.2 percent claimed to have urban *hukou*. Respondents reported an average of .488 types of unfair treatment. About 7.2 percent of the respondents worked in government organizations, and 4.0 percent were migrants living outside the registered counties of their *hukou*.

Table 1

Descriptive Statistics of Contextual and Individual Variables

Variables	Mean/ percent	SD	Min	Max
County/district level (n = 105)				
Gini coefficient	0.382	0.041	0.291	0.463
Employment rate	0.666	0.107	0.430	0.900
GDP per capita (in RMB)	36,825	42,476	4,224	242,966
Individual level (n = 21,585)				
Male	48.7%	—	—	—
Age	45.427	16.705	16	99
Years of education	6.515	4.854	0	22
Yearly income (in RMB)	9,640	22,474	0	1,203,800
Urban *hukou*	27.2%	—	—	—
Number of types of perceived unfair treatment	0.488	1.027	0	7
Government jobs	7.2%	—	—	—
Migrant	4.0%	—	—	—

Local Government Performance Rating

When respondents were asked to evaluate their local governments, 95.6 percent of the full sample provided a valid rating. Among those who responded, over half endorsed positive ratings of the local government, with 50.5 percent rating their local governments as having accomplished "some achievement" and another 7.9 percent rating their local governments as having made "good achievement." Negative ratings of "no achievement" and "worse than before" were endorsed by 11.9 percent and 2.8 percent of the respondents, respectively. The remaining 26.9 percent rated their governments as having accomplished "not much achievement."

In an unconditional model, we evaluated the ICC to be .080 at the county/district level, indicating that about 8.0 percent of the total variation was attributed to variation at the county or district level. This is relatively small considering that the respondents were asked to evaluate their government at the corresponding level.

Table 2 displays both observed and adjusted effects of contextual and individual factors on ratings of local governments. In the bivariate models, none of the studied contextual variables was related to government rating. At the individual level, most of the studied factors showed significant effects, except for years of education

Table 2

Multilevel Regression of Contextual and Individual Factors on Local Government Performance Rating

Covariates	Observed	Adjusted
County/district level		
Gini	–.039	–.028
Employment rate	.036	.061
GDP per capita	.012	.005
Individual level		
Perceived unfair treatment	–.121***	–.121***
Government jobs	.086**	.070**
Migrant	.063*	.116**
Male	.024*	.023
Age in years	.003***	.005***
Years of education	.001	.008***
Income tertile	.005	–.001
Urban *hukou*	.053**	.005

Notes: Final analytical sample size = 18,838. Observed estimates were from bivariate models where only one predictor was included at a time; adjusted estimates were from models where all predictors were added simultaneously. *$p < .05$; **$p < .01$; ***$p < .001$.

and income levels. In the adjusted model, perceived unfair treatment was negatively correlated with local government rating, with one additional type of unfair treatment associated with a .121 point reduction. Those working for government organizations tended to rate the performance of their local governments higher, as did migrants. On average, those working for government organizations rated local government performance .070 points higher than matched peers, and migrants .116 points higher. In addition, we also noted higher ratings from respondents who were older and had more years of education.

Perceived Severity of Social Issues

On average, respondents rated all issues in the middle to upper ranges of severity on a scale of 0 to 10. Table 3 shows that economic inequality received the highest average rating of 6.752 (SD = 2.605), followed by corruption (5.996, SD = 3.026).

Table 3

Average Severity Rating of Eight Major Social Issues and Prefectural-Level ICCs

Social issues	Mean	SD	ICC
Corruption	5.996	3.026	0.071
Environmental issues	5.684	2.766	0.056
Economic inequality	6.752	2.605	0.050
Employment	5.903	2.621	0.047
Education	5.351	2.812	0.042
Health care	5.519	2.801	0.060
Housing	5.477	2.905	0.076
Social security	5.288	2.767	0.058

Notes: Sample sizes ranged from 18,545 (corruption) to 19,103 (health care).

The least severe issue as perceived by the respondents was social security (5.288, SD = 2.767). ICCs at the county/district level ranged from .042 to .076 across the eight outcomes, indicating a relatively low level of clustering effect within counties or districts for the eight outcomes.

Table 4 presents the observed and adjusted effects of all studied covariates. In the observed effects models, almost all individual-level factors were significant correlates of the eight outcomes. At the contextual level, employment rate was the most predictive, followed by GDP per capita. Higher levels of employment were consistently associated with lower severity ratings in all eight outcomes.

When all other factors were fully adjusted, the effects of regional employment rates were largely attenuated but remained significant on ratings of economic inequality, employment, and health care. At the individual level, most of the significant effects persisted in the fully adjusted models. Perceived unfairness was predictive of higher severity ratings on all eight social issues, with the largest impact on corruption. Interestingly, those working for government organizations perceived higher severities than their matched peers in six of the eight social issues. Migrants also rated four of the eight issues to be more severe than local residents did, the largest effect being on housing. In addition, respondents who were younger, more educated, and with urban *hukou* tended to assign higher severity ratings. Higher income groups perceived greater severity in corruption and economic inequality, but lower severity in employment, education, and social security.

Social Trust

More (54.0 percent) endorsed the option that "most people can be trusted" than those (46.0 percent) endorsing "can't be too careful in dealing with people." Table 5 reports the observed and adjusted effects of the studied factors on generalized trust. In the observed effects model, higher per capita GDP was associated with positive generalized trust. However, the effect became nonsignificant in the adjusted model. At the individual level, all the studied factors were significant in the bivariate model. In the adjusted model, perceived unfair treatment remained significantly associated with lower levels of trust, with an additional type of unfair treatment associated with an odds ratio of .869 in positive generalized trust. Respondents with government jobs were more likely to have generalized trust, with an odds ratio of 1.144. Higher probabilities of generalized trust were found among those who were male, older, more educated, and had urban *hukou*.

Table 6 presents the average level of trust in parents, neighbors, Americans, strangers, cadres, and doctors. Not surprisingly, parents were ranked as the most trusted group on the list, with an average level of trust at 9.061 on a scale of 0 to 10. Doctors and neighbors ranked second (6.610) and third (6.389) among the six types, followed by cadres (4.898). Americans received a low level of trust among Chinese adults, with an average level of 2.440, only ahead of complete strangers (2.158). ICCs at the county/district level ranged from .045 to .095.

It is interesting to note from Table 7 that in the bivariate models, reverse directions of associations were found across trust levels toward different people. For example, a higher Gini was associated with lower trust in parents, but higher trust in Americans. Similarly, higher employment rates were associated with lower trust in parents, but higher trust in cadres and doctors. Higher GDP per capita and urban levels were associated with higher trust in parents, but lower trust in cadres and doctors. In the fully adjusted models, employment rates were positively associated with trust in all groups except parents. The Gini and GDP per capita were much less predictive than employment rates. The Gini was only positively associated with trust in Americans, and GDP per capita was negatively associated with trust in cadres.

At the individual level, most of the effects were significant in the bivariate models. In the fully adjusted model, unfair treatments remained negatively associated with trust in all, and the largest impact was on trust in cadres. In contrast, those working for government organizations showed more trust in cadres than their matched peers, and they also showed more trust in neighbors and strangers than other respondents. In addition, we noted a generally positive effect of higher education, while the effects of other individual factors were mixed.

Conclusions

Based on survey data from the nationally representative China Family Panel Studies, we found that Chinese adults on average rated the performance of their local

Table 4

Multilevel Regression of Prefectural- and Individual-Level Factors on Perceived Severity of Major Social Issues

Covariates	Corruption	Environmental issues	Inequality	Employment	Education	Health care	Housing	Social security
County/district level				Observed effects				
Gini (tertiles)	.015	–.005	–.081	0.006	.067	.019	.078	–.001
Employ rate (tertiles)	–.316**	–.168*	–.312***	–.293***	–.178*	–.334***	–.280**	–.191*
GDP per capita (tertiles)	.183	.176*	.221**	.048	0.025	.187*	.082	.156
Individual level								
#Perceived unfairness	.457***	.206***	.351***	.216***	.198***	.239***	.253***	.271***
Government job	.755***	.797***	.536***	.462***	.442***	.466***	.613***	.414***
Migrant	.401***	.551***	.424***	.155	.551***	.536***	.853***	.635***
Male	.359***	.104**	.248***	–.121**	–.286***	–.174***	–.175***	–.215***
Age	–.023***	–.037***	–.018***	–.025***	–.029***	–.019***	–.031***	–.027***
Education	.088***	.122***	.081***	.076***	.071***	.056***	.080***	.067***
Income (tertiles)	.284***	.262***	.246***	.100***	.079***	.109***	.145***	.058*
Urban *hukou*	.687***	.636***	.525***	.736***	.427***	.484***	.632***	.305***

County/district level				Adjusted effects				
Gini (tertiles)	.015	.018	–.074	.021	.075	.030	.091	.004
Employ rate (tertiles)	–.164	.003	–.174*	–.189**	–.116	–.219**	–.170	–.094
GDP per capita (tertiles)	.009	.060	.040	–.131	–.078	.017	–.077	.086
Individual level								
#Perceived unfairness	.445***	.197***	.342***	.221***	.203***	.244***	.254***	.275***
Govt. job	.243**	.224**	.071	.089	.177*	.199*	.258**	.194*
Migrant	.094	.162	.163	–.098	.272**	.326**	.551***	.360**
Male	.215***	–.010	.104**	–.163***	–.321***	–.236***	–.228***	–.255***
Age	–.017***	–.029***	–.010***	–.022***	–.025***	–.016***	–.027***	–.024***
Education	.035***	.059***	.047***	.028***	.025***	.020***	.019***	.024***
Income (tertiles)	.063**	.017	.072**	–.068**	–.056*	–.012	–.034	–.075**
Urban Hukou	.515***	.421***	.302***	.694***	.384***	.408***	.591***	.265***

Notes: Observed estimates were from bivariate models where only one predictor was included at a time; adjusted estimates were from models where all predictors were added simultaneously. *$p < .05$; **$p < .01$; ***$p < .001$.

Table 5

Odds Ratios for Generalized Trust

Covariates	Observed	Adjusted
County/district level		
Gini (tertiles)	.975	1.016
Employ rate (tertiles)	.908	1.029
GDP per capita (tertiles)	1.138*	1.013
Individual level		
#Perceived unfair treatment	.878***	.869***
Working at government organizations	1.556***	1.144*
Migrant	1.134**	1.137
Male	1.160***	1.084**
Age in years	.995***	1.004***
Years of education	1.064***	1.067***
Income (tertiles)	1.101***	.969
Urban *hukou*	1.530***	1.196***

Notes: Observed estimates were from bivariate models where only one predictor was included at a time; adjusted estimates were from models where all predictors were added simultaneously. *$p < .05$; **$p < .01$; ***$p < .001$.

Table 6

Average Rating of Trust Toward Six Types of People and Prefectural-Level ICCs

Types of trust	Mean	SD	ICC
Parents	9.061	1.698	0.071
Neighbors	6.389	2.205	0.046
Americans	2.440	2.466	0.095
Strangers	2.158	2.147	0.056
Cadres	4.898	2.468	0.045
Doctors	6.610	2.251	0.050

Notes: Sample sizes ranged from 19,977 (for Americans) to 20,788 (for neighbors).

governments as moderately positive, but they also perceived high severity of major social issues, with economic inequality deemed the most severe social issue. More than half (54.0 percent) of the Chinese adults believed that most people can be trusted. A clear divide was present in terms of whom the Chinese tended to trust, characterized by a very high level of trust in parents and very low level of trust in Americans and strangers. The apparent discrepancy between a moderate level of generalized trust and very low trust in strangers was consistent with previous research (Zhou and Hu 2013). We further found that at the county/district level, employment rates were more influential on subjective social environments than the other studied contextual factors, such as economic inequality or GDP per capita. At the individual level, perceived unfairness showed consistent negative effects on all outcomes that we studied. Working for government organizations was associated with higher ratings of local government performance and higher social trust, but also higher perceived severities in many social issues.

The overall nonsignificant effect of economic inequality, as indicated by county/district Gini coefficient, was unexpected. One possible reason for the weak association was that economic inequality was not as salient a feature as employment rates to the general public, and ordinary people may not be aware of the level of inequality (Xie et al. 2012). This was somewhat supported in our analyses of perceived severities of social issues. More specifically, we observed that the Gini coefficient was not associated with perceived severity of economic inequality, but higher employment rates were indeed related to lower severity ratings of employment issues. Xie et al. (2012) also reported that ordinary people were aware of the general levels of economic development of other countries, but not their levels of inequality. Another possibility was that Chinese in general were highly tolerant of inequality and were optimistic about their futures through social mobility despite inequality (Wu 2009). Using data from the CFPS, Wu and Xie (2013) reported a relatively high level of confidence in the future among Chinese adults. Based on our own calculation, in answering the question, "How confident are you about your future?" in CFPS 2012, over 85 percent of Chinese adults endorsed a rating of 3 or above on a scale of 1 to 5.

At the individual level, we focused on three predictors that were related to personal experiences: perceived unfair treatment, working for government organizations, and migrant status. As expected, perceived unfair treatment was consistently and negatively associated with all ratings of social environments. It was interesting to further note the differentiating effects across different outcomes. More specifically, in terms of severities of social issues, perceived unfair treatment had the largest effect on how severe corruption was viewed as being followed by inequality. Likewise, in terms of trust, perceived unfairness had a much larger detrimental effect on trust in cadres than on trust in other groups. This was to some extent related to the measurement of perceived unfairness in the CFPS, as it mostly targeted unfairness by the authorities. On the other hand, it also confirmed that even if the unfair treatment was inflicted by individuals, people tended to interpret it as actions on the part of authorities and translated it into dissatisfaction and distrust toward authorities.

Table 7

Multilevel Regression of Prefectural and Individual-Level Factors on Specific Trust

Covariates	Parents	Neighbors	American	Strangers	Cadres	Doctors
County/district level			Observed effects			
Gini (tertiles)	−.113*	−.082	.230*	.122	.082	.080
Employ rate (tertiles)	−.193**	.105	.134	.098	.330***	.284***
GDP per capita (tertiles)	.178***	.047	.185	.034	−.291***	−.219***
Individual level						
#Perceived unfair treatment	−.018	−0.156***	−.056**	−.043**	−.428***	−.174***
Working at government organizations	.275***	.294***	.338***	.416***	.010	−.085
Migrant	.129*	−.122	.194*	.115	−.282**	−.072
Male	.075**	.266***	.002	.376***	−.020	−.058
Age in years	−.015***	.003***	−.015***	−.004***	.017***	.001
Years of education	.056***	.026***	.058***	.036***	−.039***	.002
Income (tertiles)	.129***	.077***	.094***	.100***	−.156***	−.042*
Urban *hukou*	.195***	.079	.362***	.249***	−.351***	−.277***

County/district level			Adjusted effects			
Gini (tertiles)	–.089	–.065	.265**	.138	.084	.076
Employ rate (tertiles)	–.117*	.164**	.314*	.183*	.206*	.199***
GDP per capita (tertiles)	.061	.056	.260*	.061	–.174**	–.106
Individual level						
#Perceived unfair treatment	–.025*	–.164***	–.061***	–.059***	–.427***	–.177***
Working at government organizations	.007	.154*	.074	.222**	.281***	–.019
Migrant	–.031	–.081	.070	.094	–.017	–.039
Male	.018	.222***	–.034	.337***	.056	–.045
Age in years	–.010***	.010***	–.010***	–.001	.016***	.002
Years of education	.036***	.035***	.036***	.025***	.001	.015***
Income (tertiles)	.034*	.020	–.016	–.015	–.081***	–.013
Urban *hukou*	.038	–.100*	.246***	.131**	–.345***	–.296***

Notes: Sample sizes ranged from 19,045 (for Americans) to 19,815 (for neighbors). Observed estimates were from bivariate models where only one predictor was included at a time; adjusted estimates were from models where all predictors were added simultaneously. *$p < .05$; **$p < .01$; ***$p < .001$.

Empirical studies have found that having family members working for government organizations is a significant predictor of income gaps among Chinese families (Xie et al. 2013). However, those working for government organizations may not be aware of this, as they perceived higher severities than their matched peers on many social issues, except on economic inequality and employment. As expected, they also gave higher ratings to local government performance and showed higher levels of trust in cadres.

Due to the operationalization of migrants in the current analysis, we captured both migrants doing professional jobs and those doing labor intensive jobs. Migrants showed higher ratings of local governments, perceived greater severities of social issues, and also showed higher levels of generalized trust. By comparing the different sizes of effects associated with migrant status in Table 4, we were able to ascertain that migrant status had the largest impact on perceived severity of the housing problem, followed by health care, social security, and education. This may have something to do with the varying availabilities of different types of resources for migrants as compared to local residents.

Our study had a number of limitations. First, the measurement of subjective social environments, especially the local government performance rating, was relatively crude and may contain bias. The CFPS tried to minimize bias by asking that no government officials be present during the individual surveys. However, we still expected some degree of bias due to social desirability. In addition, as the government rating was asked at either the county, city, or district level, it is highly likely that different respondents interpreted the question at different levels based on personal experiences. Such variability in respondents' interpretation of the question may potentially lower the correlation between contextual level variables and the outcomes. Second, with cross-sectional data, our analyses mostly supported associations but not causal claims. We have tried to minimize confounding by including a number of key covariates at both the individual and contextual levels and estimating the model in a multilevel framework.

In sum, based on nationally representative data from the CFPS, we reported Chinese adults' mixed attitudes toward their social environments. They held moderately positive ratings of local governments, but also perceived middle to high levels of severity on all major social issues. Social trust was characterized by high trust in parents but low trust in Americans and strangers. At the contextual level, employment rates showed consistently positive effects on attitudes toward major social issues and social trust, but economic inequality had virtually no effect on subjective social attitudes. At the individual level, perceived unfair treatment was negatively associated with most outcomes.

References

Barnett, Elizabeth, and Michele Casper. 2001. "A Definition of 'Social Environment.'" *American Journal of Public Health* 91(3): 465.

Cohen-Charash, Yochi, and Jennifer S. Mueller. 2007. "Does Perceived Unfairness Exacerbate or Mitigate Interpersonal Counterproductive Work Behaviors Related to Envy?" *Journal of Applied Psychology* 92(3): 666–680.
Duch, Raymond M., and Randy Stevenson. 2006. "Assessing the Magnitude of the Economic Vote over Time and Across Nations." *Electoral Studies* 25(3): 528–547.
Hansen, Susan B. 1999. "'Life Is Not Fair': Governors' Job Performance Ratings and State Economies." *Political Research Quarterly* 52(1): 167–188.
He, Dejun. 2009. "A Balance Between Representativeness and Reliability: Internet Survey." *Practical Journalism* 2: 24–25.
Kaplan, George A., Elsie R. Pamuk, John W. Lynch, Richard. D. Cohen, and Jennifer. L. Balfour. 1996. "Inequality in Income and Mortality in the United States: Analysis of Mortality and Potential Pathways." *British Medical Journal* 312(7037): 999–1003.
Kawachi, Ichiro, Bruce P. Kennedy, Kimberly Lochner, and Deborah Prothrow-Stith. 1997. "Social Capital, Income Inequality, and Mortality." *American Journal of Public Health* 87(9): 1491–1498.
Li, L., and J. Chen. 2008. "Rural Residents' Evaluation of Local Governments and the Assoicated Factors." *Journal of Tianjin Administration Institute* 10(2): 47–51.
Lind, E. Allan, Laura Kray, and Leigh Thompson. 1998. "The Social Construction of Injustice: Fairness Judgments in Response to Own and Others' Unfair Treatment by Authorities." *Organizational Behavior and Human Decision Processes* 75(1): 1–22.
Niemi, Richard G., John Bremer, and Michael Heel. 1999. "Determinants of State Economic Perceptions." *Political Behavior* 21(2): 175–193.
Ning, K. 2010. "Trust in Local Governments and the Associated Factors." *Intelligence:* 1: 260–261.
Revelli, Federico. 2010. "Spend More, Get More? An Inquiry into English Local Government Performance." *Oxford Economic Papers* 62(1): 185–207.
Robbins, Jordan M., Michael T. Ford, and Lois E. Tetrick. 2012. "Perceived Unfairness and Employee Health: A Meta-Analytic Integration." *Journal of Applied Psychology* 97(2): 235–272.
Rutte, Christel G., and David M. Messick. 1995. "An Integrated Model of Perceived Unfairness in Organizations." *Social Justice Research* 8(3): 239–261.
Shen, Lingling. 2009. "Value and Practical Strategies for Internet Media Survey." *Practical Journalism* 2: 26–28.
Tsai, Ming-Chang, Leslie Laczko, and Christian Bjørnskov. 2011. "Social Diversity, Institutions and Trust: A Cross-National Analysis." *Social Indicators Research* 101(3): 305–322.
Tyler, Tom R., Kenneth A. Rasinski, and Kathleen M. McGraw. 1985. "The Influence of Perceived Injustice on the Endorsement of Political Leaders1." *Journal of Applied Social Psychology* 15(8): 700–725.
Uslaner, Eric M., and Mitchell Brown. 2005. "Inequality, Trust, and Civic Engagement." *American Politics Research* 33(6): 868–894.
van Wormer, Katherine, and Fred H. Besthorn. 2010. *Human Behavior and the Social Environment, Macro Level: Groups, Communities, and Organizations.* Oxford: Oxford University Press.
Wang, Xixin. 2007. "Evaluation on the Participant Evaluation System on Government Performance." *Administrative Law Review* 1: 7–13.
Wilkinson, Richard G., and Michael Marmot. 2003. "Social Determinants of Health: The Solid Facts." Copenhagen: World Health Organization.
Wu, Xiaogang. 2009. "Income Inequality and Distributive Justice: A Comparative Analysis of Mainland China and Hong Kong." *China Quarterly* 200: 1033–1052.
Wu, Xiaogang, and Jun Li. 2013. "Economic Growth, Income Inequality and Subjective

Well-Being: Evidence from China." University of Michigan PSC Research Report no. 13-796.
Wu, Xiaogang, and Yu Xie. 2013. "Attitudes." In *China Family Panel Studies: 2013,* edited by Yu Xie, Xiaobo Zhang, Jianxin Li, Qiang Ren, and Xuejun Yu, pp. 344–367. Beijing: Peking University Press.
Xie, Yu, Arland Thornton, Guangzhou Wang, and Qing Lai. 2012. "Societal Projection: Beliefs Concerning the Relationship Between Development and Inequality in China." *Social Science Research* 41: 1069–1084.
Xie, Yu, Xiaobo Zhang, Qi Xu, and Chunni Zhang. 2013. "Income Distribution." In *China Family Panel Studies: 2013,* edited by Yu Xie, Xiaobo Zhang, Jianxin Li, Qiang Ren, and Xuejun Yu, pp. 27–53. Beijing: Peking University Press.
Zhou, Yi, and Anning Hu. 2013. "The Radius of Generalized Trust in Contemporary China." *Chinese Sociological Review* 46(2): 63–90.

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