

Did Social Mobility Make Chinese Happier?

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Introduction

Happiness, also called subjective well-being, has been found to have significant influence on life outcomes. Previous research has shown that there is a strong association between happiness and longevity (Danner, Snowdon, and Friesen 2001). Previous studies have also shown that indicators of subjective well-being predict better mental and somatic health (Sadler, Miller, Christensen and McGue 2011). One conclusion of the debate on the nature of the good life by philosophies is, the good life is happy. Therefore happiness is considered to be one of the major measures of the quality of life of an individual and of societies (Diener and Suh 1998; Diener, Oishi, and Lucas 2003).

Large numbers of studies have been done in recent decades on social mobility, which includes intragenerational social mobility and intergenerational social mobility (Breen 2004). Intergenerational social mobility is the relationship between an individual's status position and his parents' status positions (Ganzeboom, Treiman, and Ultee 1991). Earlier sociological literature has argued that individuals who experienced social mobility find it hard to be fully integrated with their origin class and destination class (Blalock 1967). Conflicts of expectations and status

inconsistency can put individuals who experienced social mobility under psychological stress (Hornung 1977). However, more recent studies have shown that individuals who experienced social mobility are not more likely to be psychologically distressed (Houle and Martin 2011). A study even has shown that those who have experienced the most upward social mobility are the most satisfied with life (Clark and Angelo 2009). Social mobility has also been found to influence fertility (Sobel 1981, 1985), and the number of children may influence individuals' happiness. Social mobility can be an important indicator for predicting happiness.

In the past century, people in China have experienced several social and political upheavals, as well as economic reforms. Three major transformations include the establishment of the People's Republic of China in 1949, the Cultural Revolution between 1966 and 1976, and the economic reforms since 1978 (Lu 2004). These social transformations have significant effects on individuals' life chances and social mobility in China (Zhou and Moen 2001; Lu 2004). China is found to have most social fluidity (relative social mobility) in a study comparing social mobility among 19 industrialized and industrializing countries, yet have low total mobility rates compared to other countries, due to the large size of the farming class (Ishida and Miwa 2011). Large numbers of Chinese have experienced downward mobility or upward mobility, or both (Bian 2002). Did social mobility make Chinese happier? To my knowledge this is the first paper to examine the effect of intergenerational social mobility on happiness. With a population of 13 billion people and the rapid social changes and social mobility, China is an important and interesting case to study the

effect of social mobility on happiness.

Literature Review

Determinants of Happiness

Research in sociology, economics, and psychology has so far documented the effects of several macro-level and micro-level factors on happiness. However, the studies often yield contradictory results. Income is one of the most widely studied factors. In the article by Richard A. Easterlin (1974), the findings showed that, in the macro-level, increase in income per capita overtime is not associated with higher average happiness in the U.S.; societies with higher average income per capita do not have higher average happiness than societies with lower average income per capita. On the other hand, his study also showed that, in the micro-level, individuals with higher income are happier in the U.S. Some subsequent studies confirmed the findings that in countries like the U.S., U.K., Belgium, and Japan, while per-capita income has risen sharply, average happiness did not change or has even declined (Easterlin 1995; Diener and Oishi 2000; Lane 1998). To explain the Easterlin paradox, Clark and his colleagues (Clark et al. 2008) argued for the importance of relative income. Their findings show that happiness is negatively related to others' incomes (social comparison) and to own past income (habituation). In contrast, Hagerty and Veenhoven (2003) in their paper argued that "increasing national income does go with increasing national happiness". Di Tella and MacCulloch (2005)'s analysis of well-being in 12 OECD countries also pointed out the positive and significant effect

of GDP growth on happiness. Recent work using panel data also finds that for individuals increase in income is associated with increase in happiness (Ferrer-i-Carbonell 2005; Clark et al. 2005).

Besides national income, inequality is another macro-level factor whose effect on happiness social scientists have looked at. Higher inequality is found to be associated with lower tendency of respondents to report themselves happiness (Alesina et al. 2004). To explain why in Europe the poor and those on the left of the political spectrum are unhappy about inequality while in the U.S. the rich are unhappy about inequality, the authors argued that these are due to the perception that America is a more mobile society than Europe (Alesina et a. 2004). Even though they recognize the important effect of perceived or actual social mobility, they did not provide empirical evidence to support this argument.

Happiness and Recent Social Mobility in China

Since the 1950s, rural residents in China have large disadvantages in access to education, health care, pensions, and jobs in the urban job market compared to urban residents. With rapid economic growth since the economic reform started in 1978, living conditions for both urban residents and rural residents have been improved. Nevertheless, economic development in rural areas is much slower than in urban areas, and the urban rural gap in income has been increasing (Whyte 2010; Davis and Wang 2009). According to Whyte (2010) “The social status, mobility opportunities, ways of life, and even basic citizenship claims of China’s rural versus urban residents diverged sharply under the socialist system.” Despite this, scholars found that over

60% of rural people report themselves to be “happy” or “very happy” (Kight et al. 2009). Kight and his colleagues (Kight et al. 2009) argued that it is because rural residents in China have limited information sets, their reference group is their fellow villagers, their income has risen over time, and they expect it to rise in the future. In terms of changes of average happiness of people in the whole country, studies found that average life satisfaction score fell in the period 1994-2005 (Kahneman and Krueger 2006; Easterlin and Sawangfa 2010). In another study, Kight (2010) found that income has a positive and significant effect on Chinese people’s happiness, however, the higher people’s aspirations for income, the lower their subjective well-being. Rural-urban migrants’ reference group is other people living in the city (Kight 2010).

Wu and Treiman (2007) argued that rural-urban structural inequality in China on the one hand imposes barriers to mobility for individuals from rural origins; on the other hand this large rural-urban difference and the mobility channel through educational achievement promotes the efforts of individuals from rural origins. They found that while the immobility rate among men from rural origins is high, once individuals are able to obtain high educational achievement and urban status, the level of social fluidity among them is high (Wu and Treiman 2007). Even though the total mobility rate in China is relatively low compared to other countries, because large proportions of people with farming origins remain farmers, the social fluidity in China is relatively high (Ishida and Miwa 2011).

Consequences of Social Mobility

Scholars have documented the important effect of social mobility on human behaviors and attitudes, such as political preference, political attitudes, fertility behavior, and stress. Lipset and Bendix suggested that persistent differences in popular beliefs about social mobility between Europeans and Americans may lead to persistent differences in European and U.S. redistributive politics (Lipset and Bendix 1959; Lipset 1992). An empirical study found that in Northern Ireland intergenerational mobility is associated with more right wing views, while downward mobility is associated with more left wing views (Breen 2001).

Emile Durkheim (Durkheim p241-276) argued that social mobility and enforced social change in modern societies increased anomie and this would result in unhappiness or suicide. Blau (1956) also argued that individuals who experienced upward or downward occupational mobility face dilemmas in their interpersonal relations and this inhibit social integration. The effect of social mobility and status inconsistency result in strains and stress (Blalock, Jr. 1967). A study also showed that in rapidly emerging economies such as Russia and Peru, most of the individuals who achieved upward income mobility are currently in the middle of the income distribution, and upward income mobility is associated with increased frustration (Graham and Pettinato 2002a, 2002b). However, more recent studies show that mobile individuals are no more likely to be psychologically distressed, and those have farming origins and achieved upward mobility are less distressed (Houle and Martin 2011). Greater individual social status and greater intergenerational occupation mobility are associated with higher levels of life satisfaction (Clark and Angelo

2009).

Although some research in economics recognizes the important effect of status on happiness, status in most of the papers in economics only means relative income status, while in reality income is not the only base of status. Status is based on mode of living, a formal process of education, or on the prestige of birth, or of an occupation (Weber 1947). Psychologists have pointed out “hedonic treadmill” – reversion back to some baseline hedonic level following temporary highs and lows in happiness (Frederick and Loewenstein 1999; Brickman and Campbell 1971; Seligman 2002). However, these are mainly based on a sudden gain or loss, or a sudden change in life, and may not be applied to gradual change of circumstances. For example, social mobility can be a long term gradual process instead of a sudden change. A recent study using German data found that individuals’ happiness adapts to income, but does not adapt to occupational status (Di Tella et al.2010). Merton (1949) introduced the concept of reference group, stating individuals’ reference group can be people who share the same group membership with them or people who are in a different group, or individuals may have multiple reference groups. Merton finds that people’s aspirations, satisfaction or happiness are determined by the reference group that they compare themselves to.

Sociological theory holds that identification with groups and with individuals occupying designated statuses does not occur at random but tends to be patterned by the environing structure of established social relationships and by prevailing cultural definitions.

Merton (1949)

Experience in childhood and teenage years, and upbringing has profound influence on individuals, not only on their development in their earlier life stage but also on their attitudes and actions throughout their life. Through years of socialization with parents and other family members, not only in early stage of life, but also through their whole life even after some of the individuals experienced mobility, individuals are likely to take on the values and attitudes of their parents, at least partly. Therefore an important reference group individuals have can probably be their parents. Another reference group can be their friends and peers who grew up in the same community and shared similar family backgrounds, in other words, their friends who originated from similar social classes. Individuals are also likely to compare their current social class with their social class when they were growing up, which belonged to their parents' class. In this paper I examine the effect of social mobility, in other words intergenerational occupation mobility, on happiness. This is an explanatory study to examine if there is any effect of social mobility on happiness, and if there is, what are the relationships between social mobility and happiness. China is a good case for studying this because several decades ago large numbers of Chinese lived in poverty, and some of them still do. During several political movements in the 1940s and 1950s, the cultural revolution between 1966 and 1976, and economic reforms starting in 1978, many people in China experienced social mobility. Individuals who experienced hardship and upward mobility not appreciate what they have now better, but also possibly have a sense of achievement and admiration from their lower class family members and friends. Individuals who

experienced downward mobility are probably less happy about their current social status.

Data and Methods

Data

The data used in the paper is from the 2006 China General Social Survey. It is a national random sample of 10151 members of the population aged 18-70 in China, 6013 interviewed in urban areas, 4138 interviewed in rural areas. Intergenerational social mobility in this analysis means the occupational mobility of a respondent, in other words, compared to his parents' occupational positions when the respondent was 18 years old, whether the respondent's current occupational position has higher or lower status. I measure the occupational position of the respondent and his parents' occupational positions based on a modified version of the EGP class schema (Ganzeboom et al. 1989; Erikson and Goldthorpe 1992). I distinguish eight occupational classes as follows: (1) Higher-grade professionals, managers in large organizations, and large proprietors (I); (2) lower-grade professionals and managers in small organization (II); (3) higher-grade routine non-manual employees (clerks, secretaries etc.) (IIIa); (4) lower-grade routine non-manual employees (IIIb); (5) small proprietors (employers with small numbers of employees or self-employed) (IVa, IVb); (6) skilled manual workers (VI); (7) Semi- & unskilled manual workers (VIIa); (8) Farmers or agricultural workers (IVc, VIIb). The occupational classes are coded as eight dummy variables. I determine a single occupational position for the parents

when the respondent was 18 years old, using a ‘dominance’ approach (Erikson 1984; Breen 2004). First, if only one parent was working, that parent’s occupational position is taken as that of both parents. If both parents were working, parents’ occupational classes are further ranked as: I; II; IIIa+IVa,IVb+VI; IIIb+VIIa+VIIb+IVc, from high to low. The higher occupational class is taken as that of both parents.

The dependent variable happiness is from answers of the survey question “Generally how do you feel about your life?” Answers are coded as ordinal variable: 5= "very happy," 4 ="happy," 3= "so so," 2= "unhappy," 1= "very unhappy." ¹The data from this happiness question in General Social Survey in several other countries has been used in previous studies. Other independent variables include: a female dummy (1= “female”, 0= “male”), respondent’s years of schooling, the natural logarithm (ln) of the respondent’s age, a dummy variable for marital status (1= “married”, 0= “single, divorced, separated, or widowed”), and a dummy variable for urban residency (1= “urban”, 0 = “rural”). I deleted the samples with missing data of the variables I look at in this analysis, including 725 samples with years of schooling information missing, 1611 observations that did not work, and 1053 observations whose parents did not work.

Method

The analysis uses the diagonal reference models developed by Sobel (1981, 1985, 2004) and used by him to estimate the relative contribution of the origin and destination class to household fertility, and relative contribution of husband’s class

¹ “happy” here are translated from “幸福” in the Chinese General Social Survey questionnaire. The meaning of “幸福” in Chinese is the same as the meaning of “happy” in English, according to dictionary.

and wife's class to married women's social class identity. The models can be used to analyze the relative importance of two identically categorized variables on a dependent variable, as well as the effect of any combination of categories. The diagonal mobility models provide a means of assessing whether mobility per se has consequences above and beyond the additive effects of origins and destinations (Ganzeboom, Treiman, and Ultee 1991). The diagonal mobility model is an effective model in studying the consequence of social mobility and has been used in several empirical studies (Sobel 1985, 2004; De Graaf & Ultee 1990; Weakliem, 1992; Clifford and Heath 1993; Breen 2001; Houle and Martin 2010). I estimate the diagonal mobility model in the form of an ordered logistic model. The simplest version of the diagonal mobility model is:

$$Y_{rci}^* = \mu_{rci} + \varepsilon_{rci} = \tilde{\pi} \mu_{cc} + (1 - \tilde{\pi}) \mu_{rr} + \varepsilon_{rci},$$

R, with categories $r=1, \dots, J$, denotes the row (origin) variable and C, also with categories $c=1, \dots, J$, denotes the column (destination) variable. μ_{rci} is a weighted average of an effect (μ_{rr}) that applies to all observations from the (r)th origin state and an effect (μ_{cc}) that applies to all observations from the (c)th destination state. "individuals" in cells (r, r) and (c, c) represent the "pure" r and c individuals, respectively, and individuals in cells (r, c) represent some intermediate category. The value of the dependent variable is a weighted sum of the characteristic value in his origin class and his current class. The model can also be in the form of:

$$Y_i^* = \tilde{\pi} \sum_{j=1}^J \beta_j X_{ij} + (1 - \tilde{\pi}) \sum_{j=1}^J \beta_j Z_{ij} + \varepsilon_i, \quad (1)$$

The observed variable Y is happiness score, with categories $m=1, \dots, M$ as a quantized

version of the respondent's latent happiness Y^* where $Y = m$ if $\tau_{m-1} < Y^* \leq \tau_m$, with $\tau_0 = -\infty$ and $\tau_m = \infty$. The X s are dummy variables for current class, the Z s are dummy variables for parents' class when the respondent was 18. ε is assumed to be normally distributed with mean zero. Here i indexes observations, j indexes both origin and current class, and k indexes other independent variables (control variables). The weight of respondent's current occupational position on his happiness is denoted as $\tilde{\pi}$. The weight of respondent's parents' occupational position when the respondent was 18 years old on the respondent's current happiness is $1 - \tilde{\pi}$. To keep the weights in the interval (0,1), I parameterize the weight function as

$$\tilde{\pi} = \frac{\exp(\gamma)}{1 + \exp(\gamma)}$$

I add some other independent variables to the model, and the model becomes:

$$Y_i^* = \tilde{\pi} \sum_{j=1}^J \beta_j X_{ij} + (1 - \tilde{\pi}) \sum_{j=1}^J \beta_j Z_{ij} + \beta_k W_k + \varepsilon_i, \quad (2)$$

W_k is a vector of other independent variables (control variables). Higher value of π indicates that mobile individuals' happiness resembles their destination social class, while smaller value indicates greater resemblance to their original class (Sobel 1981, 1985). To identify the model I use the usual constraints: $\tau_1 = 0$ and $\sigma^2 = \pi^2/3$. In this paper I estimate four models. Model 0 only fits a constant term to the data, and assumes no variation in the dependent variable across either origins or current class. As show above, model 1 includes the dummies for origin class and current class and the female dummy. Previous research found that gender, education, age, marital status, and urban residency are significantly associated with happiness (Easterlin 2006; Clark,

Frijters and Shields 2008). While gender, education, and age are not results of social mobility, marital status and urban residency are possible consequences of social mobility. Individuals' social mobility experience may influence their marital status. Individuals may also obtain urban residency by achieving upward social mobility. Vice versa, marriage and urban residency may also influence individuals' social mobility. Therefore, model 2 includes only gender, age and education besides the origins effect and destinations effect, so that this model is not affected by endogeneity. While In model 3, two more independent variables, the marital status dummy and the urban residency dummy, are included. Results of model 2 can show after some of the key factors that are found to influence happiness are controlled, whether the origins effect and destinations effect are still significant. Results of model 3 can show after two more factors that are possible causes or consequences of social mobility, and are also found to influence happiness, are controlled, whether the origins effect and destinations effect are still significant.

Results and Discussion

Descriptive Statistics

As shown in Table 1, the largest outflow from each origin class is the individuals who are in the same class as their parents' class when the individuals were 18. In particular, 60% of the individuals whose parents' occupational positions were farmers are farmers themselves. About 35% of the individuals whose parents were in the class of professionals, managers, and large proprietors have become professionals,

managers, or large proprietors. Statistics in Table 1 also show that in China the mobility patterns for men and women are quite different. A larger percentage of men remained immobile or achieved upward mobility to become higher grade professionals, managers, and large proprietors than women. Also, a larger percentage of men became small proprietors and manual workers. The opposite is true in terms of routine non-manual workers and lower grade professionals and managers. There are 13% of men whose parents' occupational position was higher grade professionals, managers, and large proprietors experienced downward mobility to become farmers, larger than for women. The percentage of women who are farmers and immobile is larger than the percentage of men who are farmers and immobile. Statistics in Table 2 show that in general, the individuals who achieved the highest upward mobility to become professionals and managers are the happiest. An exception is, among women whose parents were farmers, those who became higher routine non-manual workers are the happiest. Among individuals from the higher-grade professionals, managers, and large proprietors class, there is no clear relationship between downward mobility and happiness.

Results of the models

Since the mobility pattern for men and women are quite different in China, I first include both men and women in all the models; I then have separate models for men and women. Then I use a likelihood-ratio Chi-squared test to compare the models. As shown in Table 3, the Chi-squared difference between model 1 for all and model 1 for men and women separately is 28 with 8 degree of freedom ($p=.0005$). The

Chi-squared difference between model 2 for all and model 2 for men and women separately is 32 with 10 degree of freedom ($p=.0004$). The Chi-squared difference between model 3 for all and model 3 for men and women separately is 36 with 12 degree of freedom ($p=.0003$). The results of the test show that separate models for men and women are significantly different from models including both men and women.

Model 1 improves on model 0. Model 2 (with log-likelihood -7015) improves on model 1, while model 3 does not improve on model 2. In model 1, model 2, and model 3, the estimates of $\tilde{\pi}$ (weight of destination) are all significant. This means the mobility effects on happiness are significant. In the models that include both men and women, the estimate of $\tilde{\pi}$ in model 1 is 0.639, the estimate of $\tilde{\pi}$ in model 2 is 0.569, smaller than the estimate in model 1, and the estimate of $\tilde{\pi}$ in model 3 is 0.685, the largest among all three estimates. The effect of current occupational class on happiness is larger than the effect of parents' occupational class when the respondent was 18. The estimates of the class dummies are significant, indicating the significant effects of a respondent's current occupational class and his parents' occupational class when he was 18 on his current happiness. Consistent with findings in the literature, years of schooling, being a female, and being married are significantly and positively associated with happiness. Living in urban areas and log age are negatively associated with happiness.

For both sets of models estimating the mobility effects on happiness for men and women respectively, model 1 improves on model 0, model 2 improves on model 1,

and model 3 improves on model 2. The estimates of $\tilde{\pi}$ (weight of destination) are all significant. It means the mobility effects on happiness are significant. The estimates of $\tilde{\pi}$ (weight of destination) for men are 0.791, 0.81, and 0.945 in model 1, model 2, and model 3, respectively. The estimates of $\tilde{\pi}$ (weight of destination) for women are 0.526, 0.435, and 0.55 in model 1, model 2, and model 3, respectively. This indicates that, for men, the effect of their current occupational classes on their happiness is larger than the effect of their parents' occupational class when they were 18. For women, the effect of their current occupational classes on their happiness is about the same as the effect of their parents' occupational classes when they were 18. The effect of current occupational class on happiness is larger for men than for women. A possible explanation for this is, China is a traditional and patriarchal society, an adult man is supposed to be the head of the family, so men's happiness is more influenced by their own achievements and occupational classes. A woman's happiness is influenced by her own occupational class and her family background, or her husband's occupational position, which is likely to be similar to her parents' occupational class. Another possible explanation is individuals are likely to be more influenced by the higher class, either that is their origins class or their destinations class. Since men in China have a higher upward mobility rate and a larger degree of upward mobility than women, men are probably more influenced by their destinations class. For both men and women, years of schooling, being a female, and being married are significantly and positively associated with happiness. Living in urban areas and log age are negatively associated with happiness.

The estimate for each individual is calculated as: $\mu_{rc} = \tilde{\pi} \mu_{cc} + (1 - \tilde{\pi}) \mu_{rr}$, in which μ_{cc} equals the estimate for individuals whose origin class and destination class are both the same as respondent's current occupational class. μ_{rr} equals the estimate for individuals whose origin class and destination class are both the same as the respondent's parents' occupational class when the respondent was 18. For example, based on the results of model 2, for men the odds of being in a higher happiness category vs. lower for class I vs. class VIIa is $\exp[-3.228 - (-4.104)] = 2.4$. Therefore, if a man is upwardly mobile from class VIIa to class I, he has a higher probability of being in a higher category of happiness than men who are also from class VIIa but are immobile. In another example, based on the results of model 2, for men the odds of being in a higher happiness category vs. lower for class IIIa vs. class VIIa is $\exp[-4.172 - (-4.104)] = 0.93$. Therefore, if a man moved between these two classes, his odds of being in a higher category of happiness is not largely different from men who are from either class and are immobile. Based on the results of model 2, for women the odds of being in a higher category vs. lower for class I vs. class IVc, VIIb is $\exp[-2.17 - (-2.187)] = 1.02$. For women the odds of being in a higher category vs. lower for class VIIa vs. class IVc, VIIb is $\exp[-2.445 - (-2.573)] = \exp(0.133) = 1.14$.

In other words, the results of the models that include both men and women show that, on average, for individuals whose parents' occupational classes are the same, those who achieved upward mobility are happier than those had downward mobility or are immobile. The greater the degree of upward mobility they achieved, the happier they are. In particular, given the large rural-urban disparities in well-being in China

(Treiman 2011), individuals who came from the farming class and became professionals and managers in urban areas enjoy a substantial increase in living standards. Individuals who experienced downward mobility are less happy than those achieved upward mobility or are immobile. The larger degree of downward mobility they had, the less happy they are. The individuals who are from the higher-grade professionals, managers, and large proprietors class and are immobile are the happiest. The results of model 1 show that the individuals who are from the farming class and are farmers themselves are the least happy. The results of model 2 show that after education is held constant, individuals who originated from farming class and are farmers themselves are actually happier than individuals in other low classes. Results of model 3 show that after urban residency is held constant, individuals who are immobile as farmers are the least happy.

For men whose parents' occupational classes are the same, those who are now higher-grade professionals, managers, and large proprietors are the happiest, and the second happiest are those who are now lower-grade professionals and managers. They either experienced upward mobility to become professionals, managers, and large proprietors, or are immobile if their parents were professionals, managers, and large proprietors. The ranking of the rest of the classes is less clear, and there is no clear pattern in the relationship between mobility and happiness among these classes. For women whose parents' occupational classes are the same, those who are now lower-grade professionals, managers, and large proprietors are the happiest, and the second happiest are those who are now higher-grade professionals and managers. This

could possibly be because women who became higher-grade professionals, managers, and large proprietors have higher responsibilities and stress from work, and it is harder for them to balance work and family than for women who became lower-grade professionals and managers. The next happiest are the women who became small proprietors or higher routine non-manuals. These women either experienced upward mobility from any class to become professionals, managers, small proprietors, or higher routine non-manuals, or are immobile, or experienced downward mobility from professionals and managers class to small proprietors or higher-grade routine non-manuals. There is no clear pattern in the relationship between mobility and happiness among the rest of the classes.

Moreover, Figure 2 show the distributions of estimated happiness in China, one is if there was no social mobility (if every individual has the same occupational position as their parents), the other one is with social mobility, based on the results of the models. Comparing the two distributions, it shows that social mobility has made Chinese people happier as there is a larger percentage of people with higher happiness score, and this is statistically significant.

Conclusion

This paper examined the effect of social mobility on happiness in contemporary China by using a diagonal mobility model, based on the data from 2006 China General Social Survey. The results show that an individual's current occupational class, his parents' occupational class when he was 18 years old, and intergenerational social mobility all have a significant effect on the individual's happiness. The

relationship between social mobility and happiness is quite different for men and women in China. For men, their current occupational positions have a larger effect on their happiness than their parents' occupational position when they were 18 years old. For women, the effect of their own occupational class is similar to the effect of their parents' occupational positions on their happiness. A possible explanation is, individuals who grew up in lower class families and experienced difficulties, such as relatively lack of familial and school resources, and achieved large extend upward mobility, feel a sense of achievement through hard work and efforts. This sense of achievement plus the high occupational and financial status increase their happiness.

For men, only the large degree mobility, which is mobility into and out of professionals and managers, has effects on their happiness. Since larger numbers of skilled and semi-skilled manual workers, lower routine non-manual workers are migrant workers from rural areas, and they are the lower classes in towns and cities, they are not necessarily happier than farmers even though they earn more than farmers. They may not feel a sense of achievement, or their feeling of achievement compared to their parents is not enough to largely increase their happiness when they also need to adjust to urban life and urban consumption. Possibly because women have physical constraints, or are less ambitious compared to men, mobility into and out of higher-grade routine non-manual employees and small proprietors, besides professionals and managers, have effects on their happiness.

This paper contributes to the literature on the consequences of social mobility and the literature on the determinants of happiness. For the literature on the

determinants of happiness, this paper brings in a significant factor –intergenerational social mobility, which is a measure of long term change in social status. Pecuniary factors are not the only factors that influence individuals’ happiness. Occupational positions and intergenerational occupational mobility are significantly associated with happiness. When individuals compare social status, their reference group can be their parents, themselves in the past, or their peers who are from a similar family background. For the literature on the consequences of social mobility, this paper provides evidence to show the positive effect of social mobility on individuals’ subjective well-being, instead of supporting the arguments about the negative effect of social mobility on individuals’ psychological well-being in the earlier research (Blau 1956; Dukheim). In contrast to previous literature on intergenerational social mobility that only considers the effect of fathers’ occupational positions, I also take mothers’ occupational positions into account in this study.

This first study of the effect of social mobility on happiness in China gives us some glimpse of how actual social mobility influence individuals’ happiness in a rapidly developing economy, during the process of political movements, economic reforms, and industrialization. This also can have the policy implication that, to increase people’s happiness, governments should implement policies to increase the opportunities of upward social mobility, especially for those who came from the lower classes in the society. Governments should also apply policies to help prevent large degree of downward mobility.

There are some limitations of this paper. The diagonal mobility model can be extended in many different ways, while in this paper I only use and compare four models. Since the data is only a one year cross-sectional data, the analysis can not clearly demonstrate a causal relationship between social mobility and happiness. In a future study I can extend the model, for example, to allow the weights to depend on characteristics of individuals, or add dummy variables that indicate specific mobility effects to the model. Since the happiness of individuals who experienced upward mobility and downward mobility may be influenced by origins and destinations differently, I will also try separate models for them. I will break down the sample into different cohorts do the analysis separately for different cohorts, as occupational positions and mobility experience might be very different for older cohorts and younger cohorts. I will also do separate analysis for individuals move into and out of the farming origins, as farming origins have been found to drive social mobility patterns very differently from other classes(Xie and Killewald 2012). I can also find a panel data or a multi-year cross-sectional data to study the effect of social mobility on happiness, either in China or in other countries, to see whether changes in social fluidity or social mobility rates is associated with changes in average happiness. I can also compare the effect of social mobility on happiness in different countries. I can also conduct a cross-national comparison to see whether societies with higher social fluidity or higher total mobility rates have higher average happiness. Result from these analyses can possibly explain the paradox that can not be explained by income.

Reference

- Alesina, A., R.D. Tella, R. MacCulloch. 2004. "Inequality and happiness: are Europeans and Americans different?" *Journal of Public Economic* 88:2009-2042.
- Beller, Emily. 2009. "Bringing Intergenerational Social Mobility Research into the Twenty-first Century: Why Mothers Matter."
- Bian, Yanjie. 2002. "Chinese Social Stratification and Social Mobility" *Annual Review of Sociology*.
- Blau, Peter. 1956. "Social Mobility and Interpersonal Relations." *American Sociological Review* 21:290-295.
- Blanchflower, David and Oswald, Andrew. 2004. "Wellbeing Over Time in Britain and the USA", *Journal of Public Economics*, 88(7), pp.1359-86.
- Bok, Derek. 2011. *The Politics of Happiness: What Government Can Learn from the New Research on Well-Being*. Princeton University Press.
- Breen, Richard. 2001. "Social Mobility and Constitutional and Political Preferences in Northern Ireland". *British Journal of Sociology* 52:621-645.
- _____. 2004. "The Comparative Study of Social Mobility" in *Social Mobility in Europe*. Richard Breen eds. Oxford University Press, pp.1-16.
- Brickman and Campbell 1971
- Clark, Andrew E., Fabrice Etile, Fabien Postel-Vinay, Claudia Senik, and Karine Van der Straeten. 2005. "Heterogeneity in Reported Well-Being: Evidence from Twelve European Countries." *Economic Journal*, 115(502): C118-32.

Clark, Andrew, Paul Frijters, and Michael A. Shields. 2008. "Relative Income, Happiness, and Utility: An Explanation for the Easterlin Paradox and Other Puzzles." *Journal of Economic Literature* 46:1, 95-144.

Clark, Andrew and Emanuela D'Angelo. 2009. "Upward Social Mobility, Wellbeing and Political Preferences: Evidence from the BHPS" Working paper.

Clifford, P. and Heath, A.F. 1993 "The Political Consequences of Social Mobility." *Journal of the Royal Statistical Society* 156 (1) : 1-11.

Cox, D. R.1990. "Role of Models in Statistical Analysis" *Statistical Science* 5(2):169-174.

Davis, Deborah S. and Wang Feng. 2009. *Creating Wealth and Poverty in Postsocialist China*. Stanford University Press.

Di Tella, Rafael, John haisken-De New, Robert MacCulloch. 2010. "Happiness adaptation to income and to status in an individual panel" *Journal of Economic Behavior & Organization* 76 (3):834-852.

Di Tella, Rafael and Robert MacCulloch.2008. "Gross National Happiness as An Answer to the Easterlin Paradox?" *Journal of Development Economics* 86: 22-42.

Diener, Ed and Shigehiro Oishi. 2000. "Money and Happiness: Income and Subjective Well-Being Across Nations," in *Culture and Subjective Well-Being*. Ed Diener and Eunkook M. Suh, eds. Cambridge: MIT Press, pp. 185-218.

Durkheim, Emile. 1951. *Suicide: a study in sociology*, translated by John A. Spaulding and George Simpson. Free Press.

Easterlin, Richard. 1974. "Does Economic Growth Improve the Human Lot? Some Empirical Evidence." In *Nations and Households in Economic Growth: Essays in Honour of Moses Abramowitz* ed. P.A. David and M.W. Reder. New York and London: Academic Press.

_____. 1995. "Will Raising the Incomes of All Increase the Happiness of All?" *Journal of Economic Behavior and Organization*, 27, 1-34.

_____. 2006. "Life cycle happiness and its sources: intersections of psychology, economics, and demography" *Journal of Economic Psychology* 27(4):463-482.

Easterlin, Richard and Sawangfa, O. 2010. Happiness and economic growth: does the cross section evidence predict time trends? Evidence from developing countries, in: E. Diener, J. Helliwell & D. Kahneman (Eds) *International Differences in Well-being*. Oxford University Press.

Easterlin, Richard A. 1974. "Does Economic Growth Improve the Human Lot? Some Empirical Evidence." In *Nations and Households in Economic Growth: Essays in Honor of Moses Abramowitz*, ed. R. David and M. Reder. New York: Academic Press, 89-125.

Erikson, R. 1984. "Social class of men, women and families" *Sociology* 18: 500-14.

Ferrer-i-Carbonell, Ada. 2005. "Income and Well-Being: An Empirical Analysis of the Comparison Income Effect." *Journal of Public Economics*, 89(5-6): 997-1019.

Frederick, 1999. "Hedonic Adaptation." In *Well-being: The Foundations of Hedonic Psychology*

- Frey, Bruno S. and Alois Stutzer. 2002. "Happiness and Economics: How The Economy and Institutions Affect Well-Being". Princeton University Press.
- Ganzeboom, Harry B.G., Donald J. Treiman, and Wout C. Ultee. 1991. "Comparative Intergenerational Stratification Research: Three Generations and Beyond." *Annual Review of Sociology* 17:277-302.
- Graham and Pettinato. 2002a. "Frustrated Achievers: Winners, Losers and Subjective Well-Being in New Market Economies" *Journal of Development Studies* 38(4): 100-140
- _____.2002b. *Happiness and Hardship: Opportunity and Insecurity in New Market Economies*. Washington D.C.: Brookings Institution Press.
- Hagerty, Michael R. and Ruut Veenhoven. 2003. "Wealth and Happiness Revisited: Growing National Income Does Go with Greater Happiness". *Social Indicators Research* 64(1):1-27.
- Houle, Jason and Molly Martin. 2011. "Does Intergenerational Mobility Shape Psychological Distress? Sorokin Revisited." *Research in Social Stratification and Mobility* 29:193-203.
- Hornung, C. A. 1977. "Social Status, Status Inconsistency and Psychological Stress" *American Sociological Review* 42: 623-638.
- Lipset and Bendix 1959
- Lipset. 1992.
- Knight,John, Lina Song, Ramani Gunatilaka. 2009. "Subjective well-being and its determinants in rural China". *China Economic Review* 20:635-649.

H.M.Blalock, Jr. 1967. "Status Inconsistency, Social Mobility, Status Integration and Structural Effects" *American Sociological Review* 32:790-801.

Lane, Robert E. 1998. "The Joyless Market Economy," in *Economics, Values, and Organization*. Avner Ben-Ner and Louis Putterman, eds. Cambridge: Cambridge U. Press, pp.461-88.

Merton, Robert K. 1949. *Social Theory and Social Structure*. Free Press.

Seligman. 2002.

Sobel, Michael E. 1985. "Social Mobility and Fertility Revisited : Some New Models for the Analysis of the Mobility Effects Hypothesis", *American Sociological Review* 50(5):699-712.

_____. 2004. "Men matter more: the social class identity of married British women, 1985-1991" *J.R.Statist.Soc. A* 167, part 1, pp. 37-52.

Treiman. 2012.

Veenhoven. 2000. "Freedom and Happiness: A Comparative Study in Forty-four Nations in the Early 1990s," in *Culture and Subjective Well-Being*, Ed Diener and Eunkook M. Suh, eds. Cambridge, MA: MIT Press, pp.257-88.

Weber, Max. "Status Groups and Classes," in *The Theory of Social and Economic Organization*, translated by A.M. Henderson and Talcott Parsons, pp. 424-429. Free Press.

Whyte, Martin King. 2010. "The Paradoxes of Rural-Urban Inequality in Contemporary China" in *One Country, Two Societies*, edited by Martin King Whyte, Harvard University Press.

Wu, Xiaogang and Donald J. Treiman. 2007. "Inequality and Equality under Chinese Socialism: The Hukou System and Intergenerational Occupational Mobility"

American Journal of Sociology 113: 415-445.

Xie, Yu and Killewald. 2012. "Intergenerational Occupational Mobility in Britain and the US since 1850. Comments." *American Economic Review*.

Table 1. Percentage outflow into classes according to parents' class when respondent was 18

Origin	Destination								Total ^a
	I	II	IIIa	IIIb	IVa, IVb	VI	VIIa	IVc, VIIb	
Men & Women									
I	15.5	16.4	11.8	15	9.4	14	8	10	5.4
II	12.2	18.7	9.9	12.7	8.8	14.1	8	16.2	5.3
IIIa	12.1	12.3	16	16	9.6	17.7	10.1	7.1	2.7
IIIb	9.4	13.2	8.5	20.2	10.9	15.2	16	8	1.9
IVa, IVb	5	10	11.4	18.1	22.2	12.2	11.6	8	2.2
VI	5.2	12.9	7.6	15.3	9.8	26.6	16.2	7	9.3
VIIa	6.1	10.5	8.3	12.3	8	20.3	23.5	10.1	4.7
IVc, VIIb	3	4.8	2.2	6.2	8.8	8.5	7.6	58.8	68.4
Total	5	7.7	4.6	8.9	9.2	11.8	9.5	43.2	100
Men									
I	22.4	10.6	8.8	9.4	11.2	17.7	7.1	12.9	5
II	14.9	15.5	6	7.7	9.5	18.5	11.3	16.7	4.9
IIIa	16.5	11.8	4.7	12.9	10.6	16.5	17.7	9.4	2.5
IIIb	11.4	12.9	7.1	20	8.6	12.9	21.4	5.7	2.1
IVa, IVb	2.9	7.35	13.2	8.8	26.5	17.65	19.12	4.4	2
VI	6.45	11	4	11	11	29.7	19	8.7	9.1
VIIa	7.7	10.3	6.5	9	10.3	20.7	27.7	7.7	4.6
IVc, VIIb	4.4	5.3	1.9	4.1	9.6	9.2	8.6	57	69.8
Total	6.6	7.2	3.3	6	10.1	12.9	11.2	42.8	100
Women									
I	11.3	21.2	14.3	19.7	7.9	10.3	7.9	7.4	5.9
II	9.7	21.5	13.3	16.9	8.2	8.7	5.13	16.4	5.6
IIIa	8.8	12.8	25.5	18.6	8.8	15.7	3.9	5.9	3
IIIb	5.1	13.6	10.2	20.4	13.6	17	8.5	11.9	1.7
IVa, IVb	7.4	12.4	9.9	25.9	18.5	7.4	7.4	11.1	2.3
VI	4.3	14.7	11	19.6	8.9	23.3	13.2	4.9	9.4
VIIa	5.3	10.6	10	15.3	5.9	21.2	18.8	12.9	4.9
IVc, VIIb	1.4	4.3	2.5	8.3	8	7	6.3	62.1	0.67
Total	3.4	8.2	6	11.8	8.34	10	7.6	44.8	100
Urban									
I	16.9	18.1	13.8	17.5	9.5	14.3	8.6	1.4	
II	14.3	21.2	12.9	15	8.5	16.7	9.2	1.7	
IIIa	12.2	11.7	17.8	17.2	10.6	18.9	10.6	1.1	
IIIb	10.6	13	8.9	22.8	9.8	17.1	17.1	0.8	
IVa, IVb	5.8	12.2	15.1	20.1	22.3	12.2	10.8	1.4	
VI	5.6	13.4	8.1	17	10.1	28	17.1	0.7	

VIIa	6.9	11	10	15.1	7.6	22	24.7	2.8
IVc,VIIb	6.5	9.6	5.9	16.4	18.1	17.3	14.8	11.4
Total	8.4	12.4	8.9	16.8	14	19	14.7	6.1
Rural								
I	6	0	0	2	6	12	4	70
II	4.8	6	0	4.8	8.4	4.8	3.6	67.5
IIIa	11.1	11.1	0	0	0	5.6	5.6	66.7
IIIb	0	6.7	6.7	0	13.3	0	6.7	66.7
IVa, IVb	0	4	0	4	20	12	16	44
VI	1.4	7.1	1.4	2.9	2.9	14.3	8.6	61.4
VIIa	1.9	7.4	0	3.7	9.3	11.1	16.7	50
IVc,VIIb	0.9	2	0.3	1	3.5	3.6	3.6	85.2
Total	1.1	2.4	0.3	1.2	3.8	4.1	4	83

Notes: a.This column denotes the percentage of each origin class. (I)Higher-grade professionals, managers in large organizations, and large proprietors; (II)lower-grade professionals and managers in small organization; (IIIa) higher-grade routine non-manual employees; (IIIb) lower-grade routine non-manual employees; (IVa,IVb) small proprietors; (VI) skilled manual workers; (VIIa) Semi-& unskilled manual workers; (IVc,VIIb) Farmers or agricultural workers. Data source: 2006 China General Social Survey, respondents aged 18 to 70.



Figure 1. Distribution of reported happiness. Data source: 2006 China General Social Survey.

Table 2. Group means of happiness by parents' class when respondent was 18 and respondent' class.

Parents' Occupational Class	Respondent's Occupational Class							
	I	II	IIIa	IIIb	IVa, IVb	VI	VIIa	IVc,VIIb
Men & Women								
I	3.49	3.67	3.7	3.52	3.54	3.47	3.71	3.78
II	3.75	3.75	3.5	3.61	3.56	3.48	3.48	3.52
IIIa	3.48	3.65	3.5	3.57	3.28	3.47	3.47	3.57
IIIb	4	3.88	3.55	3.38	3.36	3.26	3.1	3.27
IVa, IVb	4.13	3.73	3.35	3.41	3.3	3.72	3.68	3.42
VI	3.53	3.49	3.46	3.42	3.34	3.43	3.38	3.56
VIIa	3.71	3.79	3.48	3.35	3.65	3.35	3.4	3.41
IVc,VIIb	3.67	3.57	3.49	3.44	3.47	3.44	3.32	3.34
Men								
I	3.45	3.5	3.53	3.25	3.53	3.53	3.58	3.77
II	3.72	3.73	3.5	3.69	2.89	3.5	3.47	3.5
IIIa	3.5	3.5	3	3.36	2.89	3.5	3.47	3.5
IIIb	4.13	3.67	3.2	3.43	3	3.44	2.93	3.5
IVa, IVb	4	3.4	3.67	3.5	3.33	3.5	3.54	3
VI	3.65	3.35	3.25	3.36	3.3	3.43	3.37	3.59
VIIa	3.75	3.81	3.5	3.5	3.5	3.28	3.3	3.42
IVc,VIIb	3.71	3.58	3.32	3.5	3.43	3.43	3.27	3.36
Women								
I	3.57	3.74	3.79	3.63	3.56	3.38	3.81	3.8
II	3.79	3.76	3.5	3.58	3.75	3.59	3.5	3.47
IIIa	3.44	3.77	3.58	3.68	3.67	3.44	3.5	3.67
IIIb	3.67	4.13	3.83	3.33	3.63	3.1	3.6	3.14
IVa, IVb	4.17	3.9	3	3.38	3.27	4.17	4	3.56
VI	3.36	3.58	3.53	3.45	3.38	3.42	3.4	3.5
VIIa	3.67	3.78	3.47	3.27	3.9	3.42	3.53	3.4
IVc,VIIb	3.52	3.56	3.62	3.4	3.51	3.46	3.39	3.32

Data source: 2006 China General Social Survey, respondents aged 18 to 70

Table 3. Log-likelihoods of models and chi-squared tests of gender differences.

	All	Men	Women
Model 0	-7829	-3801	-4027
Model 1	-7903	-3840	-4050
Model 2	-7015	-3616	-3383
Model 3	-6944	-3575	-3352
Number of parameters			
Model 0	1	1	1
Model 1	10	9	9
Model 2	12	11	11
Model 3	14	13	13
Likelihood-ratio Chi-squared test			
	X ²	p	Degree of freedom
Model 1	28	0.0005	8
Model 2	32	0.0004	10
Model 3	36	0.0003	12

Table 4. Parameter estimates of mobility effects on happiness.

Class	All			Men			Women		
	Model 1	Model 2	Model 3	Model 1	Model 2	Model 3	Model 1	Model 2	Model 3
I	-2.138*** (0.14)	-2.864*** (0.393)	-2.178*** (0.394)	-2.17*** (0.175)	-3.228*** (0.524)	-2.269*** (0.541)	-2.167*** (0.205)	-2.17*** (0.547)	-1.9*** (0.566)
II	-2.2*** (0.126)	-2.904*** (0.375)	-2.284*** (0.379)	-2.44*** (0.175)	-3.557*** (0.514)	-2.6*** (0.541)	-2*** (0.17)	-1.942*** (0.535)	-1.704** (0.539)
IIIa	-2.747*** (0.153)	-3.422*** (0.39)	-2.646*** (0.389)	-3.21*** (0.233)	-4.172*** (0.554)	-3.034*** (0.536)	-2.399*** (0.201)	-2.359*** (0.545)	-2.023*** (0.548)
IIIb	-2.933*** (0.125)	-3.46*** (0.37)	-2.653*** (0.364)	-2.983*** (0.175)	-3.843*** (0.502)	-2.744*** (0.504)	-2.836*** (0.172)	-2.657*** (0.518)	-2.21*** (0.513)
IVa, IVb	-2.764*** (0.125)	-3.195*** (0.349)	-2.587*** (0.352)	-2.993*** (0.146)	-3.8*** (0.472)	-2.89*** (0.483)	-2.423*** (0.201)	-2.187*** (0.509)	-1.902*** (0.511)
VI	-3.03*** (0.1)	-3.485*** (0.356)	-2.8*** (0.357)	-3.024*** (0.127)	-3.818*** (0.479)	-2.824*** (0.487)	-3.011*** (0.145)	-2.784*** (0.509)	-2.514*** (0.516)
VIIa	-3.122*** (0.113)	-3.524*** (0.358)	-2.907*** (0.36)	-3.305*** (0.139)	-4.104*** (0.486)	-3.125*** (0.49)	-2.794*** (0.178)	-2.445*** (0.525)	-2.207*** (0.526)
IVc, VIIb	-3.12*** (0.065)	-3.288*** (0.334)	-3.011*** (0.342)	-3.062*** (0.088)	-3.689*** (0.463)	-2.979*** (0.48)	-3.137*** (0.082)	-2.573*** (0.47)	-2.709*** (0.482)
Female	0.044 (0.045)	0.092* (0.049)	0.07 (0.05)						
Education		0.07*** (0.009)	0.077*** (0.01)		0.062*** (0.013)	0.063*** (0.013)		0.073*** (0.013)	0.086*** (0.014)
Ln(age)		-0.072 (0.08)	-0.348*** (0.09)		0.062 (0.111)	-0.341** (0.123)		-0.266* (0.117)	-0.423** (0.126)
Married			0.77***			0.868***			0.69***

Urban	(0.072)	(0.1)	(0.104)
residency	-0.363	-0.261*	-0.433***
	(0.081)	(0.11)	(0.119)
\sim	0.639***	0.945***	0.55***
	0.569***	0.791***	0.435***
π	(0.2103)	(0.115)	(0.12)
	(0.0927)	(0.17)	(0.115)
Obs.	7225	6486	3170
	6486	3498	3727
Log-likelihood	-7903	-3575	-3352
	-7015	-4050	-3383
	-6944	-3616	-3840

Notes: Standard error in parentheses. Data source: 2006 China General Social Survey, respondents aged 18 to 70.

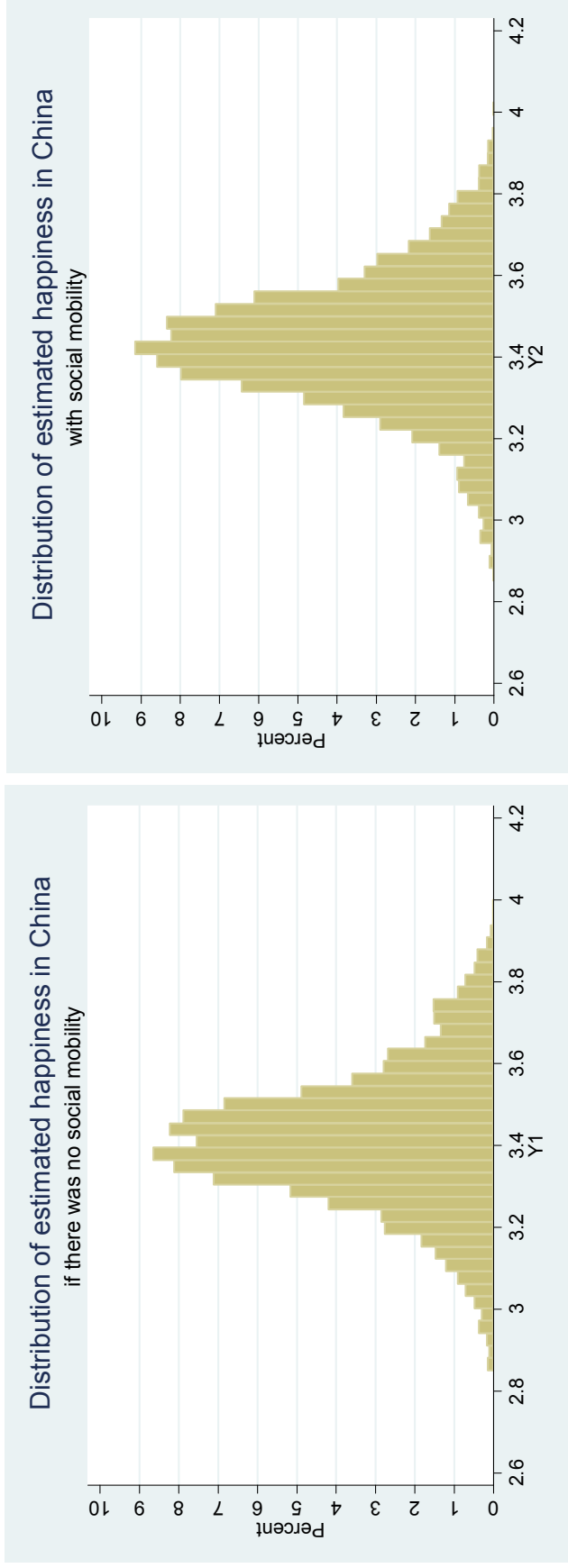


Figure 2. Distribution of estimated happiness in China, if there was no social mobility and with social mobility, men and women, based on results of model 3. Data source: 2006 China General Social Survey.