

Effects of Parental Occupations and Higher Education on Class Mobility of Offspring: A Research Study

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Abstract: Social stratum is gained through two main ways: familial background (referred to as "inherited") and individual abilities (referred to as "earned"). Using CGSS2021 data, this article uses an ordered probit model to analyze the influence of parental occupations and higher education on intergenerational social mobility. Even after robustness tests, the results remain significant. The findings are as follows: (1) Compared to parental occupations in non-governmental sectors, parental occupations within governmental institutions and social organizations exhibit a more pronounced inhibitory effect on intergenerational social mobility. Higher education plays a promoting role in intergenerational social mobility. (2) The results of regional regression analyses indicate that while higher education has a positive effect on intergenerational social mobility, regional and urban-rural disparities are evident. Therefore, there is a need for comprehensive reforms to stimulate market vitality and construct a merit-based social mobility system. Concurrently, based on principles of social equity, efforts should be made to further promote the equitable distribution of educational resources, particularly in terms of regional and urban-rural educational resource allocation, to provide a fair educational environment for class mobility.

1. Introduction

Class mobility implies whether individuals can enjoy the fruits of development through changes in their social status. Through the wide popularization of compulsory education and continuously deepening market reform, citizens achieve class mobility and share in the benefits of development through migrating. Class mobility, one of the perspectives in the study of social stratification theory regarding social equity, and Max Weber, who founded conflict theory in social stratification, believes that the "social closure" leads to inequality in wealth distribution and social status, serving as the root of conflict and struggle between different classes. Offspring social mobility reflects the degree of social closure and the changes and evolution of the social stratification system^[1]. Upward intergenerational mobility signifies the openness of social stratification, leading to a fairer and more peaceful society. Since the reform and opening up, China's social stratification has shifted from a closed structure based on identity and occupation to an open structure based on ability, achieving overall welfare improvement by Pareto improvement. The distribution and differences in social status at a certain period reflect the stratification of society during that time^[2], while social mobility is measured by the difference between current status and status in youth, reflecting intergenerational

changes and social stratification. Education has long been regarded by scholars as an effective tool for promoting social mobility (Blau, Duncan & Berat)^[3]. Tumin believes that social class is subject to the "inheritance" effect, which has intergenerational transmission. Therefore, the family background of offspring significantly influences their class distribution. Education, influenced by both family endowment and social policies, equally affects social mobility. The absence of mobility opportunities suggests that factors such as family background exert a more significant influence on individual mobility compared to personal abilities^[4]. Among related research, some scholars argue that social solidification has become a risk in our society, pointing to the increasing prevalence of the "second generation" phenomenon and analyzing it from political, economic, and educational perspectives^[5]. However, there are dissenting views claiming that social stabilization still is potential. Compared to other industrialized countries, class mobility is more open than in China^[6]. The differences between them lie in the former being based on individual perceptions by doing the subjective and micro-level research. The latter, on the other hand, adopts an international comparative perspective, making the research more objective and macro-level. Among social stratification studies, individual perception is an important perspective, as individuals directly perceive social fairness. However, it is also crucial to consider overall class mobility to reflect true social mobility comprehensively. In comparison to existing research, this study aims to explore the factors influencing class mobility among rural offspring. It seeks to integrate the concepts of "inheritance" and "ability" into the analytical model to examine their respective effects on class mobility among rural offspring. Additionally, the study employs the Ordered Probit model to measure the factors influencing class mobility among rural offspring, analyzing the effects of parental occupation and educational background.

2. Research Design

2.1 Research Hypotheses

Based on the preceding discussion, the following research hypotheses are proposed:

H1: Given the focus of this study on intergenerational class mobility, it is hypothesized that social status exhibits intergenerational transmission. Specifically, parental occupation types exert a suppressive effect on upward mobility for offspring. H2: Education is hypothesized to have a positive and facilitating effect on class mobility. It is expected that higher levels of education for offspring increase the probability of upward class mobility. H3: The level of regional economic development, indicative of market development, is hypothesized to influence intergenerational class mobility. It is hypothesized that parental occupations aligned with educational backgrounds and market capabilities will facilitate class mobility for offspring.

2.2 Variable Selection

2.2.1 Dependent Variables

Following other literature, this study considers the score indicating the current social class as the present one and the score at age 14 as the parental social class. The difference between the current and parental class scores (ranging from -9 to 9) reflects the extent of intergenerational class mobility for the offspring. To avoid issues arising from assigning too many values to the latent variable of class and to better reflect changes in social class, for the dependent variable representing class mobility, dummy coding is utilized where -2 and -1 represent downward mobility, 0 represents no change in class, and 1 and 2 represent upward mobility.

2.2.2 Independent and Control Variables

Parental Occupation (*fwork*) and Education Background (*fedu*) are mainly independent variables to discuss how they impact the ass Mobility of Offspring. Referring to previous literature, other variables that might affect individual intergenerational mobility are controlled for, including age, age squared, religious beliefs, household income, marital status, gender, and party membership. All variables, except for age, household income, and paternal education level, are dummy coded as 0 or 1. Individuals with religious beliefs, married status, female gender, and party membership are assigned a value of 1, while others are assigned 0.

3. Data Analysis

3.1 Descriptive Statistics

The data used in this study are sourced from the CGSS2021 (China General Social Survey 2021). The CGSS data consist of longitudinal survey data on families and society, covering most provinces and cities in China. The sampling method is scientifically rigorous. After excluding missing values, the sample size is 6190. Notably, the mean value of intergenerational class mobility is 0.436, indicating that the majority of offspring experience upward mobility, although the magnitude of this mobility is relatively modest (with a mean less than 1). Regarding the core explanatory variables, namely educational attainment (*edu*) and parental occupation (*fwork*), their mean values are 1.119 and 1.144, respectively. This suggests that individuals with higher education attainment among the offspring are relatively scarce, while the predominant parental occupational types among the offspring are in the categories of enterprise, self-employment, and others, with a relatively low proportion engaged in formal institutional employment. According to relevant research, the national and social management stratum comprises approximately 2.1% of the entire social class structure. This stratum, having organizational resource advantages and experiencing institutional transformations, tends to hold higher social status compared to other social strata.

3.2 Regression Analysis

$$mobility_{chi} = \alpha + \beta_0 edu_{chi} + \beta_1 vacation_f + \sum_{y=i}^n y_i control_i + \delta \quad (1)$$

As the dependent variable in this study consists of ordinal data, we utilize the Ordered Probit model to derive Maximum Likelihood Estimators (MLE) to test the hypotheses. Equation (1) is used to estimate intergenerational class mobility, where $mobility_{chi}$ represents the mobility of offspring in social class, edu_{chi} denotes the educational experiences of offspring, $vacation_f$ signifies parental occupation, $control_i$ stands for a series of control variables, and β represents the coefficients of the respective variables. This equation constitutes the basic regression model.

3.3 Regression Result

3.3.1 Baseline Regression Result

Using model (1), a regression analysis was conducted to examine the influence of parental occupation and educational background on offspring class mobility. The regression results are presented in Table 1:

Firstly, Columns (1) and (2) represent the regression results when including parental occupation and higher education separately. These results suggest that parental occupation has a inhibitory effect on offspring class mobility, while higher education has a positive effect. This implies that family

background and individual effort do not necessarily have consistent effects. However, the coefficients in the baseline regression only indicate the direction of the variables' effects on class mobility and cannot explain the magnitude of these effects. Further analysis is required to determine the specific impact of these variables on the magnitude of class mobility. Secondly, Column (3) presents the overall regression results. The regression results show that parental occupation has a negative coefficient and is significant at the 5% level, while educational background has a positive coefficient and is significant at the 1% level. This suggests that parental occupation inhibits class mobility, while education promotes it, thus validating hypothesis 2. Thirdly, Column (4) presents the regression results for downward class mobility. The results show that parental occupation is not significant, while educational background is significant at the 5% level and positive. This indicates that education promotes downward class mobility in terms of social class perception. Finally, Column (5) presents the regression results for class stability and upward mobility. The results show that parental occupation is significant at the 10% level and negative, while educational background is significant at the 1% level and positive. This suggests that parental occupation inhibits upward class mobility, while education promotes it. Furthermore, regarding hypothesis 3, the level of regional economic development has a promoting effect. Among the control variables, urban-rural status, gender, and age have inhibitory effects on class mobility, with negative coefficients significant at the 5% level in the overall regression (Column 3). Age squared, marital status, total family income, religion, economic development level of various provinces, and political identity have promoting effects on class mobility.

Table 1: Baseline Regression of Intergenerational Mobility

Var	(1) mobility	(2) Mobility	(3) mobility	(4) Mobility<0	(5) Mobility≥0
fwork	-0.079* (-1.84)		-0.093** (-2.15)	0.090 (0.51)	-0.093* (-1.77)
edu		0.13*** (3.99)	0.129*** (3.68)	0.402** (2.11)	0.107*** (2.65)
fclass	-0.373*** (-42.55)	-0.37*** (-44.82)	-0.375*** (-42.67)	-0.561*** (-11.45)	-0.206*** (-18.05)
rural	-0.114*** (-3.42)	-0.07** (-2.21)	-0.095*** (-2.82)	0.093 (0.57)	-0.062 (-1.58)
gender	-0.0627** (-2.05)	-0.068** (-2.35)	-0.074** (-2.39)	-0.241 (-1.59)	-0.059* (-1.65)
age	-0.018*** (-3.061)	-0.014*** (-2.70)	-0.014** (-2.49)	-0.074** (-2.44)	-0.002 (-0.31)
age ²	0.000*** (3.51)	0.000*** (3.52)	0.000*** (3.26)	0.001** (2.51)	0.000 (1.35)
yihun	0.176*** (4.59)	0.178*** (4.96)	0.181*** (4.71)	0.382** (2.18)	0.151*** (3.34)
religion	0.108* (1.83)	0.162*** (2.89)	0.123** (2.07)	-0.228 (-0.81)	0.159** (2.33)
Intotalincome	0.0872*** (7.26)	0.0757*** (6.76)	0.081*** (6.67)	0.160*** (2.64)	0.056*** (3.98)
lnGDPprovince	0.135*** (3.73)	0.142*** (4.24)	0.144*** (4.01)	0.001 (0.00)	0.181*** (4.26)
politic	0.142*** (5.96)	0.101*** (4.39)	0.122*** (5.002)	0.057 (0.475)	0.106*** (3.754)
region	Yes	Yes	Yes	Yes	Yes
Pseudo R ²	0.168	0.387	0.168	0.387	0.066
Prob >chi2	0.00	0.00	0.00	0.00	0.00
N	6190	6190	6190	900	5290

The asterisks in the table have the following meanings: *** $p < 0.01$, ** $p < 0.05$, * $p < 0.1$

The above results present a preliminary analysis and regression of Model (1). Several points need to be noted regarding this regression: Firstly, the class mobility examined in this study is based on subjective perceptions of the respondents, which are related to the respondents' class, education, and social factors during their adolescence. Secondly, although parental occupation has an inhibitory effect on class mobility. This suggests that the reference to parental occupation and class may be constrained by resources and endowments inherited from parents, inhibiting class mobility for the offspring^[7]. The negative coefficients for parental occupation and parental class in the regression also support this conclusion. It's possible that when parents belong to higher classes, the potential for upward mobility for their offspring diminishes.

3.3.2 Heterogeneity Regression Analysis Result

Table 2: Regional Heterogeneity Regression Analysis (Upward and Downward Mobility)

	Mobility<0			Mobility≥0		
	(1)	(2)	(3)	(1)	(2)	(3)
Var	East	center	west	East	center	west
fwork	0.231	0.317	-0.926*	-0.139*	-0.086	0.026
	(0.937)	(0.842)	(-1.735)	(-1.874)	(-0.904)	(0.204)
edu	0.289	0.554	1.051*	0.121*	0.127*	0.062
	(0.995)	(1.524)	(1.744)	(1.935)	(1.848)	(0.722)
Con var	Yes	Yes	Yes	Yes	Yes	Yes
Pseudo R2	0.377	0.463	0.60	0.088	0.072	0.044
Prob > chi2	0.00	0.00	0.00	0.00	0.00	0.00
N	465	275	160	2195	1900	1195

The results of the regional heterogeneity regression are shown in Table 2. In the subgroup of downward mobility: Firstly, in terms of downward mobility, neither parental occupation nor educational experience in the eastern and central regions passed the significance test, indicating that both are not significantly associated with the downward mobility of offspring. However, in the western region, parental occupation and educational experience are significant at the 5% level, indicating that parental occupation regression has an inhibitory effect on downward mobility, while education has a promotive effect. Although the overall trend of offspring mobility is downward, this regression analyzes the downward mobility to a relatively small extent. Therefore, higher education has an inhibitory effect on downward mobility. In the subgroups where the overall urban-rural status remains unchanged or shifts upwards, education has a promotive effect in both the eastern and central regions. In the eastern region, parental occupation exhibits an inhibitory effect. The reasons are as follows: Firstly, there are differences in economic development levels, with the eastern region bearing the majority of economic development functions, accounting for 50% of the national GDP, followed by the central region, and then the western region. The development of a market economy has led to specialized division of labor and weakened interpersonal relationships. Therefore, the effects of parental occupation on downward mobility are not significant in both the eastern and central regions. Secondly, there is an imbalance in the spatial distribution of universities. For example, the provinces and cities with the highest number of universities are Jiangsu (168), Guangdong (160), and Henan (156). Both the total number of universities and the distribution of public undergraduate universities rank high in the eastern and central regions. Therefore, education in the eastern and central regions has passed the significance test in upward mobility and contributes to upward mobility. Lastly, there is an interaction between human capital and economic development, known as the "siphon effect" of economic development on human capital, where human capital promotes economic development in a mutually reinforcing cycle. Therefore, influenced by economic development levels and life

pressures, the perception of offspring regarding social class differs from that in adolescence, resulting in heterogeneous effects.

4. Robustness Test

This study conducts a robustness test by replacing the explanatory variable with parental political variable (f politic) as the core explanatory variable. The rationale behind replacing this variable primarily stems from the following reasons: the current status of the offspring is equally influenced by both innate abilities and efforts, and parental political status is closely related to the offspring's social, cultural, and educational capital. If the results remain significant after replacing this variable, it indicates the reliability of the aforementioned results. The specific regression results and marginal effects are presented in Table 3.

Table 3: Regression Results with Core Explanatory Variable Replacement

	Coef.	Margin effect				
		-2	-1	0	1	2
Fpolitic	-0.120*** (-2.85)	0.003*** (2.77)	0.018*** (2.85)	0.017*** (2.85)	-0.033*** (-2.85)	-0.004*** (-2.78)
edu	0.132*** (3.99)	-0.003*** (-3.79)	-0.020*** (-3.98)	-0.018*** (-3.98)	0.037*** (3.99)	0.005*** (3.80)
Control var	Yes	Yes	Yes	Yes	Yes	Yes
Pseudo R ²	0.163					
Prob>chi2	0.000					
N	5809					

The table indicates that parental political status has a heterogeneous effect on intergenerational social mobility, with a negative coefficient significant at the 1% level. When the social mobility levels for the offspring are unchanged or downward (-1&-2), for each unit increase in the father's political status, there is an increase in the probability of offspring remaining unchanged or moving downward by 1.6%, 1.7%, and 0.3%, respectively. This suggests that when fathers are members of political parties, it increases the probability of offspring remaining stable or experiencing downward mobility. However, when the social mobility levels are upward (1&2), each unit increase in parental political status decreases the probability of offspring moving upward by 3.1% and 0.4%, respectively. Thus, possessing political status reduces the probability of offspring experiencing upward mobility. These results indicate that, overall, parental political status contributes to greater heterogeneity in offspring social mobility compared to those without political status, thereby corroborating hypothesis 1.

5. Discussion and Conclusion

In comparison to previous research, this study integrates the two key factors influencing offspring's social class mobility, namely "endowment" and "education," providing a more intuitive observation of the effect of each variable on class mobility and drawing the following conclusions:

Firstly, when parental occupation is associated with state institutions, it inhibits upward mobility and even increases the probability of downward mobility for offspring. Heterogeneity analysis reveals that this inhibitory effect is stronger in regions with higher levels of development. This suggests that as reform progresses, parental status within the system exerts a suppressive effect on offspring's class mobility. The composition and changes in social stratification patterns are not solely determined by economic mechanisms or the functional demands of economic-technological rationality but are also shaped through social and political processes^[8]. As a result, individuals with parental status within the system experience a decreased probability of upward mobility and an increased probability of remaining in or descending to lower social strata when they enter the competitive market. This

regression result is consistent with the ongoing economic and political reforms in China.

Secondly, education generally facilitates class mobility. However, in regional heterogeneity regression, its promotion effect is significant in the eastern and central regions but not in the western region. In subgroup regression, contrary to the overall regression results, education exhibits an inhibitory effect on downward mobility. Nonetheless, its effects on class maintenance and upward mobility remain consistent with the overall regression. This regression highlights the uneven spatial distribution of higher education resources in China, which is associated with the quantity and degree of higher education institutions. Post-market transition, the importance of higher education has increased in both professional technical positions and leadership roles^[9]. Therefore, there is a need to further promote educational equity to provide an institutional environment conducive to merit-based social mobility.

Lastly, in robustness checks, using class mobility models, the coefficient of parental occupation type still is positive, indicating a promotional effect on current social strata. This suggests that parental social, cultural, and political resources still have intergenerational transmission effects, influencing offspring's social class. Moreover, education continues to play a role in social stratification, with higher eduqx still promoting upward mobility. Hence, there is a need for further devolution of political power to empower the market and enhance class mobility. However, it is essential to simultaneously create a fair educational environment for social mobility and build a merit-based class mobility system.

References

- [1] Li Lulu, hu Bin. *Changes in the Pattern of inter generational Mobility in Contemporary China*, *Social Sciences in China*. 2015(05) P40-50.
- [2] Zhang Ming, Zhang, Xuemin, Tu Xianjin. *Does Higher Education Break down Social Class Solidification? An Empirical Study Based on Ordered. Probit Semi-parameter Estimation and Shapely Value Decomposition*. *Journal of Finance and Economics*, 2016, 42(8):15-26.
- [3] Blau P, Duncan D. *The American occupational structural [M]*. New York: John Wiley & Sons, 1967.
- [4] Chen Yunsong, He Guangye, Ju Guodong. *Irrelevant Mobility Perception: Has Class Become Solidified in China?* *Sociological Review of China*, 2019, 7(6):49-67.
- [5] Yang Wenwei, Ma Ning. *The Intrinsic Logic and Negative Effects of Social Stratification becoming Entrenched*. [J]. *Tribune of Social Sciences* 2015(5):166-178.
- [6] Zhou, Xiang, and Yu Xie. 2019. "Market Transition, Industrialization, and Social Mobility Trends in Post-Revolution China." *American Journal of Sociology* 124(6): 1810-1847.
- [7] Qi Xiulin, Wang Xin. *An Investigation of the Relationship between identity of the Parent within System and Intergenerational Mobility of Social Class in Context of Economic Svstem Changes*. *Population and Development*, 2019, 25(6): 16-27.
- [8] Li Lulu. *Institutional Transformation and Changes in Strati-fiction Structure: Dual Reproduction of the Pattern of Relative Inter-strata Relations*. *Social Sciences in China*, 2002(6):105-118.
- [9] Andrew Walder, Bobai Li, Donald Treiman, "Politics and Life Chances in a State Socialist Regime: Dual. Career Paths into the Urban Chinese Elite, 1949 to 1996" *American Sociological Review*. 2000, 65.