Original Paper

The Effect of College Student' Employment Anxiety on Academic Involution: The Chain Mediating Role of Academic Stress and Future-oriented Coping

Xinyu Jia[1]

[1] Qufu Normal University, Jining, Shandong, China

Abstract

Under the background of China's social and economic transformation and development, the imbalance between supply and demand in the job market and the prominent phenomenon of employment anxiety among college students, coupled with the rapid development of higher education, more and more students are devoting their energy to academics in order to gain more advantages in the job market, which leads to the serious phenomenon of academic involution. Using random sampling, 413 college students were selected for the questionnaire survey. By constructing structural equation modeling, Bootstrap method was used to test the chain mediating role of academic stress and future orientation coping between employment anxiety and academic involution of college students. The results showed that employment anxiety and academic stress differed significantly across genders, with females scoring significantly higher than males; employment anxiety positively predicted academic involution, academic stress and future-oriented coping mediated the chain between college students' employment anxiety and academic involution, with a mediation effect accounting for 52.8% of the total. The results of the study revealed that it is necessary to implement the employment support policy for college students, solve the problem based on the root cause, help college students establish the awareness of future-oriented coping, avoid the employment risk in advance, adjust the level of their academic pressure, and develop together in a benign competition.

Keywords

college students, employment anxiety, academic involution, academic pressure, future-oriented coping

1. Background of the Study

The phenomenon of college students' employment anxiety is serious in the context of the new era. In recent years, the employment pressure of college students in China has risen sharply, and the phenomenon of employment anxiety is serious. Under the influence of the new coronary pneumonia epidemic, most students tend to choose more stable jobs, the number of people appearing for public office and editorializing has increased dramatically, coupled with the high-speed development of the digital economy in the context of China's economic transformation, many traditional industries have been impacted, some of the positions with lower technical content and higher repetitive labor have been replaced, and the employment market has an imbalance between supply and demand. At the same time, higher education is expanding, the number of college graduates is increasing dramatically. The employment situation of college students has become increasingly severe and complicated. The difficulty of employment has become a common problem faced by college students, which has led to an increase in the phenomenon of employment anxiety among college students. A large number of studies have shown that college students, especially college graduates, suffer from generalized employment anxiety (He, W. Y., 2022, pp. 115-117; Jiang, C. L., 2008, pp. 131-132; Li, J. P., 2009, pp. 99-101; Li, L. F., 2016, pp. 104-105).

Under the state of high-speed development of Chinese society, college students' academic involution has become a major factor affecting the academic development of college students' groups. Under the state of high-speed development of Chinese society, the word "involution" has become a hot word of our time, which has been widely used in all sectors of society, especially in the field of higher education (Ma, X. Y., 2021, p. 104). Contemporary college students are faced with the employment pressure of mismatch between their own conditions and job requirements. Most of them have to join the irrational competition of mismatch between payoffs and rewards in order to get more employment "chips" than others in the case of limited resources (Ma, X. Y., 2021, p. 104). This has also given rise to other hot topics such as "the long shirt of Kong Yi Ji" and the universal examination for graduate school. However, for college students, the phenomenon of academic involution is no longer just a positive motivation for self-improvement and the pursuit of excellence, but has become a helpless and necessary survival strategy under the current environment. Influenced and pushed by those around them, students are forced to join this wave of involution. The whole group of college students is caught in a cycle of "investing energy-dissatisfied with the result-investing more energy", in which the individual's efforts are not commensurate with the results obtained (Zhou, X. T., Wei, J. & Chen, C. L., 2022, pp. 131-140).

Under the increasingly severe employment situation, it is very important for college students to respond to the possibility of their future employment in advance and preventive response. At the same time, under the general environment of academic involution, the academic pressure felt by college students has also increased. It has been shown that under the support of "involution", college students'

employment anxiety has increased, which is manifested in a series of academic involution phenomena such as brushing credit and grade-point in their behaviors.

Future-oriented coping and academic pressure are closely related to college students' academic involution. Research on the influence factors of academic involution found that future-oriented coping and academic stress significantly and positively predicted the level of students' academic engagement. Future-oriented coping, as a strategy for students to set and plan for their future goals and to take specific actions to achieve those goals, plays a role in facilitating students' learning. Relevant studies have shown that students with a clear future orientation tend to show a higher level of learning conscientiousness and initiative. They not only clearly recognize the importance of learning, but also take the initiative to seek all kinds of learning resources, make reasonable learning plans and put them into practice. This enables them to remain calm and focused when facing academic pressure, and thus devote more time and energy to their studies. In addition, moderate academic pressure can stimulate students' motivation to study and prompt them to study harder. However, when academic pressure exceeds students' ability to cope with it, a series of negative impacts will occur. Excessive academic pressure can cause students to develop emotional problems such as anxiety and depression, which in turn reduces their level of academic engagement.

It can be seen that there is a theoretical connection between college students' employment problems and academic "involution" problems, so what is the mechanism of influence between these? In this paper, we will use data to empirically investigate the role of academic stress and future orientation coping variables in the influence of employment anxiety on academic involution.

2. Definition of Core Concepts

This study defines college students' employment anxiety as the negative psychological state of worry, nervousness, and agitation about the possibility of not being able to achieve their original employment goals, as well as the adverse cognitive, physiological, and behavioral changes triggered by such a psychological state, when college students have not yet secured an employment unit, or when they encounter difficulties in the process of job searching due to insufficient psychological preparation.

There is still no precise definition of academic involution, and most scholars have traced the evolution of the meaning of the term "academic involution" back to its roots, leading to the current definition of the term "academic involution". In recent years, the term "academic involution" has appeared frequently in the field of higher education, and has even been "out of the loop" to various sectors of society to depict the phenomenon of irrational and excessive competition (Chen, X., 2004, pp. 101-104). As far as the university student group is concerned, the meaning of academic involution bound has gone beyond pure personal improvement and become a kind of survival choice forced by irrational and excessive competition. This choice means that the whole college student group is caught in a cycle of "investing energy-dissatisfied with the result-investing more energy", accompanied by the

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spread of a negative emotion closely related to stress and anxiety (Wen, M. & Gan, Y. Q., 2012, p. 330). In view of this, this study defines college students' academic involution as the state of internal consumption and disordered competition caused by college students' continuous increase of study inputs in the pursuit of goals or opportunities under the situation of give-and-take imbalance.

The study adopts the World Health Organization's definition of academic stress, which defines academic stress and its manifestations as "a situation in which some students, when faced with an academic life event, perceive it as a challenge or a potential threat, which in turn leads to a negative psychological response such as anxiety, depression, or fear".

Future-oriented coping is a new perspective in the field of coping research, and its concepts and related theories are derived from the expansion of the traditional stress-coping theory (Wu, J., 2016, pp. 432-434). At present, there is no consensus in the academic community on the concept of future-oriented coping, Yiqun Gan et al. confirmed from the perspective of empirical research that future-oriented coping includes pre-emptive coping and preventive coping, with the former referring to the fact that people take certain measures in advance so as to successfully avoid the occurrence of a crisis event or to minimize the impacts brought about by the event, and the latter referring to the fact that people take measures in advance so as to ensure that their own abilities can still be enhanced in the future to achieve the goals that could not be previously accomplished in the future (Aspinwall, L. G. & Taylor, S. E., 1997, pp. 417-436).The study adopts the definition of Yiqun Gan.

3. Theoretical Foundations

3.1 The Theory of Meritocracy

Meritocracy, some scholars call it "elitism" or "elite rule", etc. (Schwarzer, R. & Taubert, S., 2002, pp. 77-80). Its essence is a principle and system, refers to the distribution of political and economic resources through the degree of ability and effort (Gan, Y.-Q., Zheng, W. & Wen, Y., 2009, p. 471). The meritocracy rule asserts that social and economic rewards should be distributed on the basis of individual merit (Spielberger, C. D., 1996). This logic has a certain degree of rationality, and is based on the idea that people compete on an equal footing, with the top performers ultimately winning. In the field of education, this concept is particularly significant, and the college entrance examination is the most prominent form of meritocracy.

With the popularization of higher education, in order to further enhance their competitiveness, college students began to compete for higher level diplomas or degrees. Out of the future employment and job market competitiveness considerations, more and more students' motives are increasingly utilitarian. In the case of increasingly fierce competition in education, meritocracy has gradually evolved into a kind of "comprehensive strength" competition. The competition in education has become more intense, and meritocracy has gradually evolved into a "comprehensive strength" competition (Spielberger, C. D., 1996). It can be seen that, with the development of society and the popularization of education, the rule

of meritocracy brings about an intensification of competition, which in turn leads to the phenomenon of academic involution.

3.2 Self-determination Theory

Self-determination embodies the potential of individuals to make choices about their experiences. This ability stems from a deep understanding of the needs of the self and a comprehensive grasp of information about the environment, and it allows the individual to make choices of action based on his or her own judgment and will, within a framework of autonomy and freedom, without external constraints.

Adhering to the theoretical foundation of humanism, self-determination theory distinguishes two types of human behavior, self-determined behavior and non-self-determined behavior. Self-determined behavior is based on the individual's active cognition and choice, which reflects human initiative and self-will; while non-self-determined behavior is expressed as a kind of automaticity, which is often directly affected by external factors (Li, J. P., 2009, pp. 99-101).With the continuous change of the employment situation, the academic development behavior of college students responds to the changes in the external environment showing the phenomenon of "involution", which is a choice made by college students based on individual needs and environmental changes.

4. Literature Review

First of all, there is a significant correlation between college students' employment anxiety and academic involution. Ma Xueyan's research shows that under the support of "internalization", college students' employment anxiety is aggravated, which is manifested in a series of academic involution phenomena such as brushing credits, brushing grades and so on (Ma, X. Y., 2021, p. 104). Numerous theoretical studies have also pointed out that one of the reasons for aggravating the academic involution phenomenon is the increase of employment pressure and the frequent generation of employment anxiety phenomenon.

Secondly, there is a significant correlation between future-oriented coping and employment anxiety and academic involution. A series of studies by Gan Yiqun's team on future-oriented coping found that the motivation to pursue success reduces academic burnout and promotes academic engagement through the two-phase sequential mechanism of future-oriented coping, and that future-oriented coping has a significant effect on job search stress (Li, J. P., 2009, pp. 99-101; Wu, J., 2016, pp. 432-434). Xie et al. also found that future orientation negatively predicted academic burnout through positive coping in their study on the relationship between future orientation coping and academic burnout (Liang, X. Y., 2012, pp. 124-127).

Again, academic stress was significantly correlated with employment anxiety and academic involution. Numerous theoretical studies have pointed out that one of the triggers of academic involution in college students is the tremendous academic stress felt by students (Aspinwall, L. G. & Taylor, S. E., 1997, pp.

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417-436; Folkman, S. & Moskowitz, J. T., 2004, pp. 745-774). Zhou Jun's study showed that college students' academic stress positively predicted academic engagement (Zhou, J., 2022). Fang Yi et al. found that a major source of academic stress among college students was employment issues (Fang, Y., Dong, Y. Y. & He, W. B., 2019, pp. 1-2).

First, the existing literature mainly uses theoretical research methods to analyze and elaborate the definition, classification, causes, and ways of avoidance of college students' academic involution in some detail. Secondly, different scholars have studied the phenomenon of college students' academic "involution" based on different research perspectives, and these studies have special characteristics, and these multidimensional perspectives have constructed a more comprehensive research field. However, most of the studies regarded college students' academic involution as a psychological phenomenon and analyzed the psychological causes behind it. In addition, existing research shows that the phenomenon of college students' academic involution in China has brought about many negative impacts, and it has become a top priority to analyze the nature of the phenomenon and its influencing factors as early as possible to solve the problem.

To summarize, this study will quantitatively investigate college students' employment anxiety, academic stress, future-oriented coping, and academic involution, reveal the mediating mechanism of academic stress and future-oriented coping in college students' employment anxiety and future-oriented coping, and better explore the way to solve the phenomenon of college students' employment anxiety and academic involution.

5. Research Design

5.1 Research Subjects

In this study, a random sampling method was used to conduct an online questionnaire survey on 450 freshmen to fourth-year students from several key universities in Shandong Province, Hubei Province, and other provinces; 37 invalid questionnaires were excluded, and 413 valid questionnaires were obtained, with a recovery rate of 91.7%. Among them, 93 (22.5%) were male and 320 (77.5%) were female; 173 (41.9%) were freshmen, 52 (12.6%) were sophomores, 112 (27.1%) were juniors, 73 (17.7%) were seniors, and 3 (0.7%) were seniors.

5.2 Research Instruments

The scales used in this study were all based on a 5-point Likert scale, with points from 1 to 5 representing a gradual increase in the degree of conformity (1=very poorly conformed, 2=comparatively poorly conformed, 3=fairly conformed, 4=comparatively conformed, and 5=very well conformed), with no reverse scoring items.

1) Employment anxiety scale.

This study used the Employment Anxiety Diagnostic Scale developed by Zhang Xiaoqin, which consists of 12 questions (e.g., "The thought of employment makes my heart heavy like a stone"),

including four dimensions: employment anxiety, interview anxiety, job anxiety, and employment fear.

2) Academic inventory scale.

This study used the Personal Academic Inventory Scale for College Students developed by Zhou Xiting, Wei Jun, and Chen Chunlin (Zhou, X. T., Wei, J. & Chen, C. L., 2022, pp. 131-140). The scale consists of six questions (e.g., "I often compete fiercely with my classmates in academics") and has a unidimensional structure. In this study, the Cronbach's coefficient of the Academic Inventory Scale is 0.892, which has good reliability.

3) Academic stress scale.

In this study, the academic stress scale from the China College Student Mental Health Screening Scale was used. The scale consists of four questions (e.g., "Feeling difficulty in studying") and has a unidimensional structure. In this study, the Cronbach's coefficient of the Academic Stress Scale was 0.853, with good reliability.

4) Future oriented coping scale.

Based on the proactive coping dimension scale in the Active Coping Scale developed by Esther Greenglass et al., six question items were deleted to obtain the Future Oriented Coping Scale used in this study. The scale consists of eight questions (e.g., "I am a responsible person") with a unidimensional structure. In this study, the Cronbach's coefficient of the Future Oriented Coping Scale is 0.877, which has good reliability.

5) KMO test and Bartlett's Sphericity test.

KMO test and Bartlett's Spherical Test were used in this study. The results show that the KMO coefficient of the data is 0.938, the KMO value is more than 0.8, Bartlett's spherical test significance $p<0.001$, the structural validity of the questionnaire is good and suitable for factor analysis.

5.3 Research Hypotheses

Through the combing of existing literature, this paper clarifies the relationship between the four variables of college students' employment anxiety, academic introspection, academic pressure, and future orientation coping, and this paper proposes the following research hypotheses:

Hypothesis 1: College students' employment anxiety has a significant positive effect on academic involution.

Hypothesis 2: College students' academic stress and future orientation coping have a chain mediating role in the effect of employment anxiety on academic introspection.

In summary, this study constructed a chain mediation model to simultaneously examine the relationships among college students' employment anxiety, academic stress, future orientation coping, and academic involution.
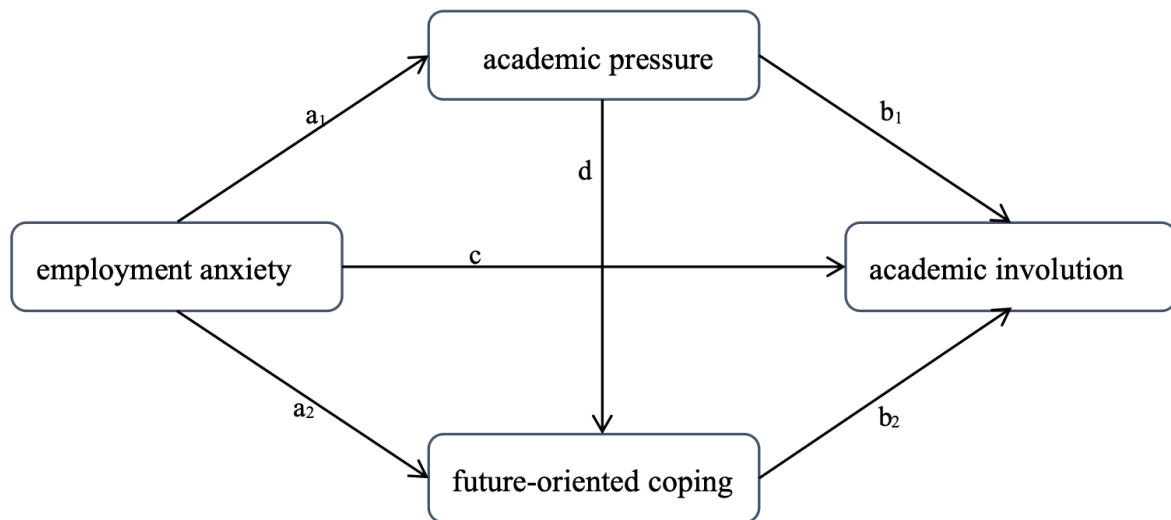
Figure 1. Diagram of Theoretical Model

6. Research Findings

6.1 Analysis of Gender Differences in Employment Anxiety, Academic Involvement, Academic Stress, and Future Orientation Coping

Independent samples t-test analysis was used to test whether there are significant differences in employment anxiety and its dimensions, academic stress of college students across genders. The results, as shown in Table 1, showed that the four dimensions of employment uneasiness ($p<0.01$), interview anxiety ($p<0.001$), job anxiety ($p<0.001$), employment fear ($p<0.001$), and the total score of employment anxiety ($p<0.001$), and academic stress ($p<0.01$) differed significantly on different genders, which was specifically shown in the differences between female students in employment uneasiness, interview anxiety, job Anxiety, Employment Fear, Employment Anxiety, and Learning Stress scores are significantly higher than those of boys; there is no significant difference between genders in Academic Involvement as well as Future Orientation Coping.

Table 1. Differential Results Analysis by Gender

	Gender	M	SD	t	p
Employment Anxiety	Male	2.99	1.12	-3.42**	0.001
	Female	3.44	1.11		
Interview Anxiety	Male	3.12	1.05	-3.78***	0
	Female	3.58	1.01		
Job Anxiety	Male	2.77	1	-4.45***	0
	Female	3.29	0.97		

Employment Fear	Male	2.92	1.03	-3.61***	0
	Female	3.34	0.97		
employment anxiety	Male	2.93	0.97	-4.24***	0
	Female	3.4	0.91		
academic involution	Male	2.68	0.88	-1.83	0.07
	Female	2.86	0.75		
academic pressure	Male	3.08	0.91	-2.93**	0.004
	Female	3.37	0.83		
future-oriented coping	Male	3.48	0.76	-1.48	0.142
	Female	3.61	0.58		

6.2 Impact Analysis of Employment Anxiety, Academic Involvement, Academic Stress, and Future Orientation Coping

1) Common method bias test

In this study, Harman's one-factor method was used to conduct the common method bias test. The results showed that the variance explained by the 1st factor was 35.865%, which was smaller than the critical criterion of 40%, indicating that there was no significant common method bias in this study.

2) Correlation analysis of employment anxiety, academic involution, academic stress, and future orientation coping

The correlation coefficients of the main variables in this study are shown in the table. From the table, it can be seen that there is a significant positive correlation between college students' employment anxiety, academic introspection, academic pressure, and future orientation coping: employment anxiety and academic introspection show a significant positive correlation, indicating that students with a high degree of employment anxiety have a higher level of academic introspection ($r=0.50$, $p<0.01$); employment anxiety and the mediator variable of academic pressure show a significant positive correlation, indicating that students with a high degree of employment anxiety have a high level offuture orientation coping ($r=0.65$, $p<0.01$); employment anxiety showed a significant positive correlation with the mediator variable academic stress, indicating that students with a high level of employment anxiety had a high level of academic stress ($r=0.44$, $p<0.01$); and there was a significant positive correlation between academic introspection and academic stress, indicating that students with a high level of academic introspection felt more academic stress ($r=0.41$ $p<0.01$); academic involution and future orientation coping showed a significant positive correlation, indicating that students with a high degree of academic involution had a high degree of future orientation coping ($r=0.51$, $p<0.01$); and academic stress and future orientation coping showed a significant positive correlation, indicating that students with a high degree of academic stress had a high degree of future orientation coping ($r=0.43$, $p<0.01$).

Table 2. Correlation Analysis of Employment Anxiety, Academic Involution, Academic Pressure, And Future-Oriented Coping

	employment anxiety	academic involution	academic pressure	future-oriented coping
employment anxiety	1			
academic involution	0.50**	1		
academic pressure	0.65**	0.41**	1	
future-oriented coping	0.44**	0.51**	0.43**	1

3) Regression analysis among employment anxiety, academic introspection, academic stress, and future orientation coping

Under the premise that the four variables show significant correlation, the explanations and predictions of college students' employment anxiety, academic stress, and future orientation coping on academic introspection are further examined by multiple linear regression analysis. In this study, academic involution was used as the independent variable, and employment anxiety, academic stress, and future orientation coping were analyzed as the dependent variables.

As shown in Table 3, in the regression model of employment anxiety, academic stress, future orientation coping and academic introspection, the VIF value is less than 2, indicating that there is no problem of covariance among the independent variables; the adjusted R2 value is 0.330, indicating that the predictive power of college students' employment anxiety, academic stress, and future orientation coping on academic introspection reaches 32.2%; and according to the B-value, employment anxiety (p<0.01), academic stress (p<0.01), and future orientation coping (p<0.01) significantly and positively predicted the level of academic involution of college students.

Table 3. Multiple Linear Regression Results

	Unstandardized Coefficients		Standardized Coefficients	t	p	Covariance statistics	
	B	SE	β			VIF	Tolerance
(Constant)	0.503	0.190	-	2.645	0.008	-	-
employment anxiety	0.208	0.045	0.251	4.597	0.000	1.830	.546
academic pressure	0.242	0.050	0.263	4.830	0.000	1.817	.550
future-oriented coping	0.234	0.057	0.187	4.070	0.000	1.292	.774

R^2	0.335
Adjusted R^2	0.330

4) Chain mediation test of academic stress and future-oriented coping between employment anxiety and academic involution among college students

(a) Chain mediation model fitness of academic stress and future orientation coping

From the correlation results, it can be seen that there is a significant correlation among the four components of employment anxiety, academic involution, academic stress, and future orientation coping among college students. Based on the research hypotheses, this study used Amos 24.0 to construct a structural equation model to test the chain-mediated effects of future orientation coping and academic stress between college students' employment anxiety and academic engagement internalization. As shown in Figure 2, the structural equation model was established by taking college students' employment anxiety as a predictor variable, academic engagement internalization as a calibration variable, and academic stress and future orientation coping as mediator variables. The fit indexes are shown in Table 4, the value of 2/df is 2.974, which is less than the critical value of 5; the value of RMSEA is 0.069, which is less than the critical value of 0.08; the values of IFI, TLI, CFI are 0.929, 0.919, 0.929, respectively, which are all greater than the critical value of 0.9. In summary, the structural equation model established in this study has a good fit degree.

Table 4. Chain Mediation Model Fit Metrics

Fitting metrics	χ^2/df	RMSEA	IFI	TLI	CFI
	2.974	0.069	0.929	0.919	0.929

(b) Chain-mediated model path analysis of academic stress and future-oriented coping

As can be seen from Figure 2, employment anxiety significantly and positively predicts academic stress (β=0.72, p<0.001) and future orientation coping (β=0.26, p<0.001), academic stress significantly and positively predicts future orientation coping (β=0.29, p<0.001), and future orientation coping positively and positively predicts academic intraprogression (β=0.19, p<0.001), which indicates that higher levels of employment anxiety among college students are associated with higher levels of academic stress, which in turn leads to higher levels of future orientation coping and ultimately higher levels of academic involution.
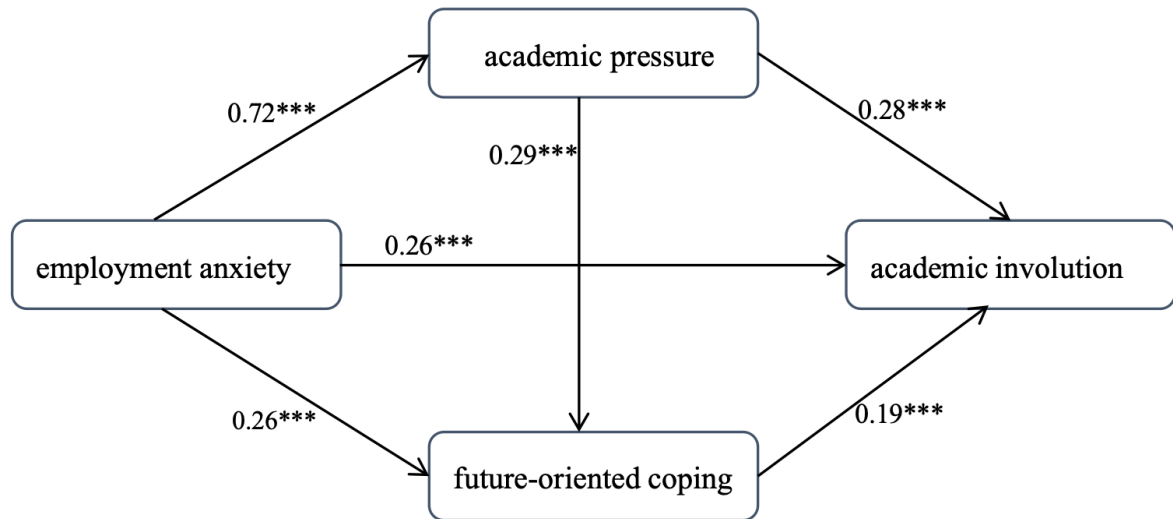
Figure 2. Chain Mediated Role Model of Academic Stress and Future Orientation Coping

(c) Mediating effect test of academic stress and future-oriented coping

Using Bootstrap to test the significance of the mediating effect, the chain mediating role model diagram was constructed with college students' employment anxiety as the independent variable, academic investment involution as the dependent variable, and academic stress and future orientation coping as the mediating variables. According to the operation procedure, the sample size is set to 5000, the confidence interval is 95%, and the calculation is executed. The results are shown in Table 5, first, the total effect value of college students' employment anxiety on academic involution is 0.432, with a Bias-corrected 95% confidence interval of 0.349 to 0.528, not including 0, indicating that the total effect of college students' employment anxiety and academic engagement involution is significant. Second, after controlling for the effects of the two mediating variables of academic stress and future orientation coping, the value of the direct effect of college students' employment anxiety on the internalization of academic engagement was 0.204, with a Bias-corrected 95% confidence interval of 0.089 to 0.321, not including 0, indicating that there was a significant positive direct effect of college students' employment anxiety on the internalization of academic engagement. Finally, the mediating effect value of academic stress between college students' employment anxiety and academic involution was 0.157, with a Bias-corrected 95% confidence interval of 0.060 to 0.261, not including 0, indicating that academic stress played a positive and significant part of the mediating effect between employment anxiety and academic involution; and the mediating effect value of future-oriented coping between college students' employment anxiety and academic involution was 0.040, with an intermediate effect value of 0.040, with an intermediate effect value of 0.321, indicating that the positive direct effect of college students' employment anxiety and academic involution was significant. Effect value is 0.040, with a Bias-corrected 95% confidence interval of 0.012 to 0.085, not including 0, indicating that

future-oriented coping positively and significantly partially mediates the effect between employment anxiety and academic involution; the chained mediation effect value of academic stress and future-oriented coping between employment anxiety and academic involution is 0.031, with a Bias-corrected 95% confidence interval of 0.012 to 0.067, not including 0, indicating a significant positive chain mediated effect of academic stress and future orientation coping, and the research hypothesis 2 is valid. The total indirect effect value was 0.228, accounting for 52.8% of the total effect, respectively. In summary, academic stress and future orientation coping have a chain-mediated effect between college students' employment anxiety and internalization of academic engagement, acting as partial mediators.

Table 5. Chained Mediation Effect Test Table for Academic Pressure and Future-Oriented Coping

	Path	ES	SE	Bias—corrected 95%CI		Effect ratio
				Lower	Upper	
Direct effect	employment anxiety-academic involution	0.204	0.059	0.089	0.321	47.20%
Indirect effect	employment anxiety－academic pressure－academic involution	0.157	0.051	0.06	0.261	36.40%
	employment anxiety－future-oriented coping－academic involution	0.04	0.018	0.012	0.085	9.20%
	employment anxiety－academic pressure－future-oriented coping－academic involution	0.031	0.013	0.012	0.067	7.20%
	Total indirect effect	0.228	0.052	0.131	0.336	52.80%
Total effect	employment anxiety-academic involution	0.432	0.045	0.349	0.528	

7. Results and Discussion

This study took 413 undergraduate students from several provinces, including Shandong Province and Hubei Province, as research subjects to explore the chain mediating role of academic stress and future orientation coping in the effect of employment anxiety on academic involution. By analyzing and validating the data, this study mainly obtains the following three conclusions and further analyzes the reasons for the possibility of the research conclusions.

7.1 College Students' Employment Anxiety and Academic Stress Are Significantly Different By Gender

It is found that there are significant differences in employment anxiety and academics among college students of different genders.

First, on different genders, female students scored significantly higher than male students in employment anxiety, which is consistent with the findings of Zhang Yuzhu (Wen, M. & Gan, Y. Q., 2012, p. 330). Since the reform and opening up, China has made remarkable achievements in promoting women's employment, however, women still face many challenges in the job market, which make women need to cross higher thresholds in employment and suffer greater employment anxiety compared with men.

First of all, one of the major obstacles is the constraints of traditional attitudes. In traditional societal attitudes, it is generally believed that women should be more responsible for their families rather than fully engaging in the workplace or their studies. This notion not only restricts women's career and academic choices, but also increases their pressure in balancing family and career or studies. Secondly, women tend to be under more pressure of childbearing and family responsibilities. During childbearing and breastfeeding, they need to devote a lot of time and energy to taking care of their children and families, which will undoubtedly have a negative impact on their employment and studies. Lastly, gender discrimination is also an important obstacle that women face in workplace promotion and career development. Despite their outstanding performance at work, women often find it difficult to get the same opportunities for promotion and pay rises as men. This unfair treatment makes women feel frustrated and lost, further aggravating their employment pressure.

Secondly, on different genders, female students scored significantly higher than male students on academic stress, which is consistent with Deng Qi's findings (Spielberger, C. D., 1996). In their academic pursuits, women are not only committed to achieving excellent grades as a way to demonstrate their personal abilities and values, but also to deal with the high expectations from their families and society. Given the relatively limited employment opportunities for women in the workplace, they often need to strive for equal employment opportunities with men through higher academic qualifications. Therefore, women not only have to demonstrate academic excellence, but also have to face additional social expectations and employment challenges.

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7.2 Employment Anxiety Is a Significant Positive Predictor of Academic Introspection

First, employment anxiety positively predicts the level of academic introspection of college students. One of the most important factors affecting academic engagement is employment (Yang, X. Q., Xu, Y. Y. & Wang, Y., 2022, pp. 118-123), and in order to alleviate this anxiety and gain an advantage in the competition for employment, students join the competition for "internalization". The expansion of colleges and universities has led to an increase in the number of graduates from colleges and universities, and an increase in the number of graduate students, while at the same time the threshold of the job market has also been raised, from college to bachelor's degree to master's degree, and even to doctoral degree. The depreciation of academic qualifications brought about by the expansion of colleges and universities, the increase in the pressure of employment competition, and the high employment expectations of individuals can lead to employment anxiety and other psychological problems, resulting in the phenomenon of employment anxiety among college students, which also affects the positioning of college students and their planning for the future, and exacerbates the phenomenon of academic involution (Zhao, G. N., 2014, p. 117).

7.3 Academic Stress and Future-Oriented Coping Have a Chain Mediating Role in the Effects of Employment Anxiety on Academic Involution

Academic stress and future-oriented coping have a chain mediating role in the effect of employment anxiety on academic involution, i.e., students with high levels of employment anxiety feel higher levels of academic stress and further increase their levels of future-oriented coping, which ultimately leads to an increase in the prevalence of the phenomenon of academic involution. Employment anxiety is a kind of disturbing behavior and emotion generated by job search. Numerous studies in China have shown that employment stress aggravates students' academic stress (Hu, Y. H. & Liu, H. M., 2020, pp. 100-106). Students with a high level of academic stress, driven by pressure, tend to save for a rainy day and act in advance for more advantages in their future job market, and the degree of future-oriented coping, as an individual's proactive coping oriented toward the stressor, deepens accordingly. It has been shown that future-oriented coping will increase the level of academic engagement (Wen, M. & Gan, Y. Q., 2012, p. 330), and at the undergraduate level, the early coping with employment uncertainty is more reflected in the academic aspect, and the deepening of the degree of future-oriented coping will increase the degree of students' academic involution. Therefore, college students with higher levels of employment anxiety tend to increase their advance preparation for future uncertainty events in order to improve their competitiveness in the job market during college, driven by higher academic pressure, which is more reflected in academic involution at the undergraduate level.

8. Insights and Recommendations

8.1 Implementing Employment Support Policies and Solving Problems Based on Root Causes

The employment of college graduates is related to people's well-being, economic development and the future of the country. In recent years, the government has introduced employment subsidies, job expansion subsidies, social security subsidies and other policies to address the difficulty of college graduates in finding employment, as well as the implementation of grassroots programs such as the "Three Supports and One Support" program. However, as the total number of college graduates in China continues to expand, and the pressure on the total employment of college graduates coexists with structural contradictions, the problem of difficult employment for college students has always been in an urgent position. In this regard, the government should implement employment assistance policies, establish a convenient and efficient exchange platform for enterprises, schools and students, and conduct legal and compliant employment exchange information sharing through network information platforms. At the same time, it should strengthen the control of the employment market, maintain the fairness and order of the employment market, and crack down on "black intermediaries" and other undesirable problems. Only in a fair, orderly and healthy employment environment can college students really give full play to their talents and potentials and realize the value of their lives. By solving the fundamental problem of employment, we can reduce the behavior of college students to get more weight in the job market and reduce the unnecessary consumption caused by internal scrolling.

8.2 Establishing a Sense of Future Response and Rational Planning of Academic Employment

First of all, college students should analyze themselves, give themselves a clear positioning, rational planning of their own life, and at the same time set up a correct career concept, have a full understanding of each occupation, according to the general environment of the career planning, the establishment of a compatible with their own, in response to the changes in the external environment of the academic as well as employment planning, to avoid getting caught in the wave of involution. In this process, schools need to strengthen the construction of career guidance teachers, provide college students with employment information, help students understand the job market and employment situation, guide students to discover their strengths and interests, and guide them to set up the correct concept of employment. At the same time, diversified teaching activities are carried out to cultivate students' comprehensive quality and innovation ability, so that they can have more competitiveness. Secondly, college students themselves need to maintain a strong internal drive, focus on self-improvement, maintain an upward trend, and be firm on their own path, so as to avoid being "swept away". At the same time, they should not stick to the traditional thinking, and participate in a variety of activities in order to explore more fields in this ever-changing society.

8.3 Adjusting the Level of Academic Pressure and Healthy Competition for Common Development

Facing the severe employment environment as well as the phenomenon of involution, college students should maintain their determination, reduce the unnecessary internal conflict brought by involution, accurately recognize the gap between ideals and realities, face up to this gap instead of escaping or blindly pursuing unrealistic goals, actively adjust their mindset, and face all kinds of challenges and difficulties with a calm and rational attitude. On the basis of completing academic tasks, they should participate in more social practice activities, accumulate practical experience, better understand social needs and career development trends, and gradually clarify their career direction accordingly, so as to be fully prepared for future employment. At the same time, college students should also actively seek new tracks, not limited to the traditional employment field, and dare to try new fields and industries. In this fast-changing era, new careers and positions are constantly emerging, and college students should keep a keen insight to seize the opportunities and challenge themselves. Most importantly, college students should put themselves in a larger context, focusing not only on their own development, but also on the development of society and the country as a whole. Involvement is not the only way out, keep a positive mindset, improve their own hard power, and open up a new track with personal characteristics is the way to crack involvement.

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