

# Is The Death Anxiety of College Students Serious? -----the Effects of Personality Traits and Negative Coping

Yongmei Hou\*, Jingyi Fang

Department of Psychology, School of Humanities and Administration, Guangdong Medical University,  
Dongguan, Guangdong, 523808, China

**Abstract: Objective** To study the characteristics of death anxiety, coping strategies and personality traits in college students, and analyze the relationship among the 3 variables. 553 college students were randomly selected from Guangdong Medical University, Dongguan College of Technology, and Guangdong Polytechnic Normal University. They were assessed with Chinese Version of Templer-Death Anxiety Scale (CT-DAS), Simplified Coping Strategy Questionnaire (SCSQ), and Eysenck Personality Questionnaire-Revised Short Scale in Chinese (EPQ-RSC). **Results** (1) The scores of CT-DAS, positive coping, negative coping, psychoticism, neuroticism, extroversion, and honesty were (45.32±5.76), (22.09±5.92), (10.47±4.35), (19.75±3.30), (17.73±3.37), (16.73±3.41), (17.07±2.18), respectively. (2) There was a pairwise correlation among the total score of CT- DAS, negative coping and neuroticism ( $r = 0.290, 0.084, 0.280, P < 0.05$ ), as well as a pairwise correlation among the score of CT-DAS, negative coping and extroversion ( $r = 0.290, -0.126, -0.149, P < 0.01$ ). (3) The score of negative coping had a partly mediating effect in the relationship between the score of neuroticism and CT-DAS in college students, with the mediation effect accounting for 7.5% of total effect. Also, the score of negative coping had a complete mediating effect in the relationship between the score of extroversion and CT-DAS in the college students, with the mediation effect accounting for 29.7% of the total effect. **Conclusions** Personality traits not only have direct roles on the death anxiety in the undergraduates, but also indirectly affect it through negative coping.

**Keywords:** College Students; Death Anxiety; Coping; Personality Traits; Mediating Effect

## I. Introduction

Death anxiety (DA) is a basic source of anxiety, referring to a conscious or unconscious psychological state created by the initiation of defense mechanisms in the face of death threats [1]. The reason is lack of a sense of control and meaning for life. Everyone is more or less afraid of death, which makes individuals have a wide sense of inadaptability. Therefore, people take various psychological defense measures to suppress or reduce their psychological pressure [1]. However, it can never be eliminated. Death anxiety has been lurking in unconsciousness, with a lifetime [1-2], which has a profound impact on people's emotions, behaviors and social functions [3]. Moderate death anxiety has the value of survival adaptation [4], is the core source of motivation and the most powerful power of social emotion, which makes people more eager to pursue the meaning for life [5-6]. Excessive death anxiety is the inducement and core element of mental disease, psychosomatic disease and behavior problems [7-9].

Personality is a relatively stable and specific mode of integration that individuals exhibit in terms of thinking, emotion and behavior, etc. Coping style is the will effort to regulate one's emotion, cognition and behavior in the face of stress events and stress situations. It is the intermediary mechanism between stress and mental health, and

has buffer effect [10].

According to the concepts of death anxiety, personality and coping style, there is a close relationship among them. Death anxiety is a form of anxiety, which is bound to be regulated by the psychological integration model of personality. Coping style is the expression of behavior, cognition and emotion when dealing with difficult or stressful events, which can be said to be the personality characteristics in predicament. Death anxiety is caused by the lack of control for life (i.e., the lack of effective coping methods for death). It is the performance of coping style on the issue in life and death [1]. On the other hand, a large number of empirical studies show that there is a significant pairwise correlation between personality traits, coping styles and death anxiety [12-17]. We can assume that there is a mediating effect between personality traits, coping styles and death anxiety. Specifically, death anxiety is an individual's response to behavior and emotion, which belongs to the result variable. Personality traits are deep, distal psychological quality (antecedent variables). Coping style is the individual to deal with life events, is the surface, proximal psychological quality (antecedent variables). Personality traits are more mediated by coping styles.

Based on the above analysis, we can assume that coping style plays an intermediary role between personality traits and death anxiety.

## II. Objects and Methods

### 2.1 Objects

A total of 650 undergraduates from Guangdong Medical University, Dongguan College of Technology, and Guangdong Polytechnic Normal University were randomly selected. 553 valid questionnaires were collected, and the effective rate was 85.1%. Among them, 305 were male and 248 were female. There were 208, 142, 101 and 102 freshmen, sophomores, juniors and seniors, respectively.

### 2.2 Tools

#### 2.2.1 Chinese version of Templer - Death Anxiety Scale (CT-DAS)

The scale is compiled by Templer (1967) [18] and modified by Yang Hong (2012) [19]. There are 15 items in total, with a single dimension, which are scored by Likert 5 points. They are divided into 5 grades: "very agree", "comparatively agree", "uncertain", "comparatively disagree" and "very disagree", which are rated as 1-5 points respectively. The higher the total score, the more serious the death. The total score of more than 35 points is high death anxiety. In this work, Cronbach's coefficient of the questionnaire is 0.794.

#### 2.2.2 Simplified Coping Strategy Questionnaire (SCSQ)

The questionnaire is compiled by Xie Yaning (1990) [20]. There are 20 items in total, which are divided into two subscales: positive coping and negative coping. Likert's 4-point score is adopted, which is divided into 4 options: "do not use", "occasionally use", "sometimes use" and "often use", with 0-3 points respectively. The higher the score of a certain dimension, the stronger its tendency. In this work, the Cronbach's coefficient of the total scale is 0.903. The Cronbach's coefficients of positive coping subscale and negative coping subscale are 0.874 and 0.823, respectively.

#### 2.2.3 Eysenck Personality Questionnaire - Revised Short Scale in Chinese (EPQ-RSC)

The questionnaire is compiled by Eysenck (1996) [21] and revised by Qian Mingyi et al. (2000) [22]. There are 48 items in total, including 4 subscales: extroversion (E), neuroticism (N), psychoticism (P) and validity (L). The Cronbach's coefficients of P, E, N and L are 0.690, 0.762, 0.782 and 0.804, respectively.

### 2.3 Data handling

SPSS20.0 is used to process valid data. The main statistical methods are descriptive statistics, Pearson correlation analysis, linear regression analysis, etc.

## III. Results

### 3.1 Overall situation of death anxiety of college students

The score of CT-DAS was  $(45.32 \pm 5.76)$ , and 508 students (accounting for 91.9%) had more than 35 points.

### 3.2 Correlation analysis on research variables

According to Table 1, there was a significant pairwise correlation between CT-DAS score, negative coping and

neuroticism ( $r=.290, .084, .280$ , all  $P < 0.05$ ). There was a significant pairwise correlation between CT-DAS score, negative coping and extroversion ( $r= .290, -.126,-.149$ , all  $P < 0.01$  ).

Table 1. Correlation analysis on research variables

	M	SD	Death anxiety	Positive coping	Negative coping	Psychoticism	Nervosity	Extrovez^s Honesty
Death anxiety	45.32		1					
Positive coping	22.09		-.187**	1				
Negative coping	10.47		.290**	-.127**	1			
Psychoticism	19.75		-.062	.198**	-.210**	1		
Nervosity	17.73		.084*	-.181**	.280**	-.108*	1	
Extroversion	16.73		-.126**	.262**	-.149**	-.115**	-.231**	1
Honesty	17.07		.044	.010	.046	-.164**	.243**	.287**

Note: \* $p < 0.05$ , \*\* $p < 0.01$

### 3.3. Mediating effect test

#### 3.3.1 Mediating effect of negative coping on neuroticism and death anxiety

Due to the significant correlation between CT-DAS, negative coping and neuroticism scores, it meets the conditions of the mediating effect test. Firstly, the scores of CT-DAS, negative coping and neuroticism are decentralized, and then the mediating effects of the above three variables are tested according to the method proposed by Wen Zhonglin [23]. The results are shown in Table 2.

Table 2. Mediating effect of negative coping on neuroticism and death anxiety

Step	Independent	Dependent	Standard	Adjust R <sup>2</sup>
First step	neuroticism	CT-DAS score	.326***	.105
Second step	neuroticism	Negative	.152***	.077
Third step	neuroticism	CT-DAS score	.281***	.127
	Negative coping		.160***	

Note: \*\* $p < 0.01$ , \*\*\* $p < 0.001$

It can be seen from Table 2 that a, b, c, c' are all significant. Therefore, the mediating effect of negative coping between neuroticism and CT-DAS score is partial mediating effect. The ratio of mediating effect to total effect is: effect  $m = ab/c \times 100\% = 0.152 \times 0.160 / 0.326 \times 100\% = 7.5\%$ .

#### 3.3.2. Mediating effect of negative coping on extroversion and death anxiety

Due to the significant correlation between CT-DAS, negative coping and extroversion scores, it meets the conditions of the mediating effect test. Firstly, the scores of CT-DAS, negative coping and extroversion are decentralized, and then the mediating effects of the above three variables are tested according to the method proposed by Wen Zhonglin [23]. The results are shown in Table 3.

Table 3. Mediating effect test of negative coping on extroversion and death anxiety

Step	Independent	Dependent	Standard coefficient	Adjust R <sup>2</sup>
First step	Extroversion	CT-DAS score	-.114**	.011
Second step	Extroversion	Negative	-.149***	.020
Third step	Extroversion	CT-DAS score	-.081	.060
	Negative coping		.227***	

Note: \*\* $p < 0.01$ , \*\*\* $p < 0.001$

It can be seen from Table 3 that a, b, c are significant, but c' is not significant. Therefore, the mediating effect of negative coping between extroversion and CT-DAS score is complete mediating effect. The ratio of mediating effect to total effect is: effect  $m = ab/c \times 100\% = (-0.149) \times 0.227 / (-0.114) \times 100\% = 29.7\%$ .

## IV. Discussion

The results showed that the college students' CT-DAS score was (45.32±5.76), and 508 students (91.9%) scored above 35 (high death anxiety). Consistent with the results of previous studies [15, 19, 24-25], it suggests that college students generally have higher death anxiety. Based on fear management theory [3], individuals mainly fight death anxiety caused by the consciousness of death through three defense mechanisms: world outlook, self-esteem and intimate relationship. College students have problems in all three aspects, so their death anxiety buffer mechanism is also very fragile. First of all, the cultural worldview in Chinese current society is in a period of alternation and adjustment. In such a period, people have many explanations for the meaning of death,

and some people even have doubts about any explanation. College students are in the period of forming the world outlook. They are curious about any kind of cultural worldview, but most of them do not believe in any of them. In this way, it is difficult for them to obtain corresponding respect from their recognition of a cultural worldview. Secondly, due to the fact that self-identity has not been established yet, and "employment difficulty" has been increasing year by year and life pressure is increasing day by day, they are not easy to make achievements in their career, entrepreneurship or family and marriage life, so self-esteem is difficult to establish [26]. Thirdly, due to the influence of psychological closeness [27], college students are neither happy nor good at self-disclosure. They are alienated by lack of communication, making it difficult for them to establish close relationships (including same-sex close friendship and heterosexual partnership).

There are direct and indirect effects between neuroticism and death anxiety of college students.

On the one hand, the neuroticism and death anxiety of college students are significantly positively correlated, which is the direct effect between them, consistent with the results of previous studies [14-15]. People with high neuroticism often lack the ability of emotion regulation, and are prone to stress and anxiety due to life pressure, resulting in more serious self-accusation and even pessimism and leading to more intense death anxiety.

On the other hand, there is an indirect effect between neuroticism and death. It is manifested in the following ways: neuroticism - negative coping - death anxiety (i.e., negative coping plays a part of the intermediary role between neuroticism and death anxiety). Neuroticism is more likely to take a negative response [12-15], leading to problem accumulation and excessive pressure, further hindering problem solving, damaging self-esteem and aggravating death anxiety.

This work found that there is an indirect effect between extraversion and death anxiety. In other words, extraversion does not directly lead to death anxiety. Only when the extraverts take a negative response, leading to accumulated problems and excessive stress, will they blame themselves for inferiority and generate or aggravate death anxiety.

## V. Conclusion

This work preliminarily revealed the relationship between personality traits and death anxiety of college students, and verified the following assumptions. College students generally have high death anxiety. Extroversion indirectly affects the death anxiety of college students through negative coping. There is a direct positive correlation between neuroticism and death anxiety of college students, and neuroticism also can indirectly affect the death anxiety of college students through negative coping. Based on this result, the following recommendations are made for family and school education: the death anxiety of college students should be properly regulated. We can start from strengthening the mental health education and mental quality training for college students. On the one hand, it helps them to establish correct values, improve personality traits, and form a scientific outlook on life and death. On the other hand, it improves college students' positive coping ability, so that they can effectively solve various life events, protect and strengthen their sense of self-esteem. In the future, we can further verify the relationship between personality characteristics and death anxiety of college students.

## References

- [1] Arndt J, Greengerg J, Pyszynski T, et al. Subliminal exposure to death-related stimuli increases defense of the cultural worldview [J]. *Psychological Science*, 1997, 8(5): 357-370.
- [2] Tomer A. Death anxiety in adult life-theoretical perspectives [J]. *Death Studies*, 1992, 16(6):724-741.
- [3] Hayes J, Schimel J, Arndt J, et al. A theoretical and empirical review of the death-thought accessibility concept in terror management research [J]. *Psychol Bull*, 2010, 136(5): 699-739.
- [4] Sha Jiaqiang. Death: Extension of life—exploring the life connotation of death from existentialist philosophy [J]. *Lanzhou Academic Journal*, 2008, 28(2): 199-201.
- [5] Landau MJ, Greenberg J, Solomon S, et al. Windows into nothingness: Terror management, meaninglessness, and negative reactions to modern art [J]. *Journal of Personality and Social Psychology*, 2006, 90(6): 879-892.

- [6] Lyke J. Associations among aspects of meaning in life and death anxiety in young adults [J]. *Death Studies*, 2013, 37(5): 471-482.
- [7] Iverach L, Menzies RG, Menzies RE. Death anxiety and its role in psychopathology: Reviewing the status of a transdiagnostic construct [J]. *Clin Psychol Rev*, 2014, 34(7): 580-593.
- [8] Mejia MI, Hyman SMI, Behbahani SI, et al. Death anxiety and ageist attitudes are related to trainees' interest in working with older adults. *Gerontology & Geriatrics Education*, 2018, 39(3): 341-356.
- [9] Ciocca Giacomo, Limoncin Erika, Lingiardi Vittorio, et al. Response regarding existential issues in sexual medicine: The relation between death anxiety and hyper sexuality [J]. *Sexual Medicine Reviews*, 2018, 6(2): 335-336.
- [10] Bruce E. Compas, Jennifer K. Connor-Smith, Heidi Saltzman. Coping with stress during children and adolescence: Problems, progress, and potential in theory and research [J]. *Psychological Bulletin*, 2001, 127, 87-127.
- [11] Osborne John W. An existential perspective on death anxiety, retirement, and related research problems [J]. *Canadian Journal on Aging*, 2017, 36(2): 246-255.
- [12] An Yuanyuan, Wu Xinchun, Liu Chunhui, et al. The influence of emotional personality on post-traumatic growth in adolescents: The mediating role of coping styles and the moderating role of social support [J]. *Chinese Journal of Psychological Development and Education*, 2013, 29(6): 657-664.
- [13] Gao Bin. Correlation between coping style and personality characteristics for post-90s college students [J]. *Social Psychological Science*, 2015, 29(10): 1061-1063.
- [14] Liu Xiaofeng. Research on the relationship between coping styles and quality of life in the elderly and death anxiety—Mediating effects of trait anxiety personality [D]. Sichuan Normal University, 2013, 06.
- [15] Qiu Qi, Fang Yuan, Lin Xiang, et al. Analysis of death anxiety for college students and its influencing factors [J]. *Journal of Shanghai Jiaotong University (Medical Edition)*, 2015, 35(10): 1512-1515.
- [16] Tu Yangjun, Guo Yongyu. The role of taoist personality in fighting death anxiety [J]. *Research of Psychology and Behavior*, 2014, 12(1): 115-123.
- [17] Kenneth E Vail III, Emily P Courtney, Elizabeth A Goney, et al. Anxiety buffer disruption: relationship threat, death anxiety, and coping appraisals among low and high posttraumatic stress symptom samples [J]. *Journal of Social and Clinical Psychology*, 2019, 38(6): 501-511.
- [18] Templer DI. The construction and validation of a death anxiety scale [J]. *J GenPsychol*, 1970, 82 (2dHalf): 165-177.
- [19] Yang Hong, Han Lisha, Guo Haoming. Cross-cultural adaptation of Death Anxiety Scale [J]. *Chinese Journal of Practical Nursing*, 2012, 28(31): 53-57.
- [20] Xie Yaning. Preliminary Study on reliability and validity of the Simple Coping Style Scale [J]. *Chinese Journal of Clinical Psychology*, 1998, 6(2): 53-54.
- [21] Eysenck HJ. *Manual of the Eysenck Personality Scale (EPS Adult)* [M]. London: Hodder & Stoughton Publishers, 1996.
- [22] Qian Mingyi, Wu Guocheng, Zhu Rongchun, et al. Eysenck Personality Questionnaire-Revised Short Scale in Chinese (EPQ-RSC) [J]. *Acta Psychologica Sinica*, 2000, 32(3): 317-323.
- [23] Wen Zhonglin, Hou Jietai, Zhang Lei. Comparison and application of regulatory effect and mediating effect [J]. *Acta Psychologica Sinica*, 2005, 37(2): 268-274.
- [24] Farid Abolfazl, Habibikaleybar Ramin, Gobadi Leyla, et al. Prediction of students' attitudes toward euthanasia using their religious orientation, self-esteem and death anxiety [J]. *Health, Spirituality and Medical Ethics*, 2017, (1): 2-7.
- [25] Rao Jia, Qiu Qi, Zhang Shengyu, et al. A comparative study on the death anxiety of nursing and non-medical college students [J]. *International Journal of Psychiatry*, 2016, 43(4): 584-587.
- [26] Max Research Institute. Blue book of employment: 2018 China university student employment report [EB / OL]. <http://ruthout.com/information Z15375.html>.
- [27] Lin Chongde (Editor). *Developmental Psychology (Second Edition)* [M]. Beijing: People's Education Press, 2014.

