

Practical Exploration of Online Cultivation of Positive Psychological Qualities in College Students

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Abstract: Psychological education is an important part of college education. Strengthening mental health education in colleges is a top priority in the educational work of universities. It is urgent to vigorously cultivate positive psychological qualities in college students, prevent and treat psychological disorders, and continuously enrich and optimize the system for cultivating positive psychological qualities in students. This study explores the cultivation of positive psychological qualities in college students from the perspective of online education. First, a survey was conducted on the current state of online ideological and political education among 4,374 students at a university in Xi'an. Subsequently, a randomized intervention experiment was conducted on 480 students to provide online positive psychological intervention. The experimental results show that through online positive psychological intervention, various dimensions of positive psychological levels in college students have improved. This provides new methodological approaches and practical evidence for enriching and optimizing the online cultivation system of positive psychological qualities in college students.

1. Introduction

The report of the 19th National Congress of the Communist Party of China clearly stated the need to "strengthen the construction of a social psychological service system and cultivate a social mentality of self-esteem, self-confidence, rationality, peace, and positivity." Since then, the construction of a social psychological service system has been formally incorporated into the national strategy. This also indicates the specific direction and strategies for the construction of psychological services in colleges. Under the guidance of positive psychology theory, positive psychological qualities in students can be cultivated by stimulating their potential, fostering positive emotions, and establishing supportive social relationships [1]. Among the various explorations and attempts in the cultivation of positive psychological qualities, the popularization and development of the internet have provided a new platform for the cultivation of positive psychological qualities. Compared to traditional methods of psychological cultivation, online cultivation has unique advantages such as strong accessibility, a wide target audience, low cost, and strong sustainability. It can break through time and space limitations and compensate for resource deficiencies, making it

worthy of widespread promotion in college mental health education [2].

2. Research Subjects and Methods

2.1. Research Subjects

The experiment was divided into two stages: a questionnaire survey and a randomized intervention experiment. In the first stage, a questionnaire survey was conducted among 4,374 college students at a university, covering basic information and positive psychological qualities. In the second stage, based on the survey results from the first stage, a randomized intervention experiment was conducted, dividing 480 students into an experimental group and a control group for positive psychological intervention.

2.2. Research Tools and Methods

2.2.1. Positive Psychological Capital Scale

The Positive Psychological Capital Questionnaire (PPQ) compiled by Zhang Kuo (2010) and others from Nankai University, based on Luthans' psychological capital theory, was used as the measurement tool. The questionnaire's dimensions and meanings are consistent with Luthans' psychological capital theory, and the target audience is college students. It includes four dimensions: self-efficacy, resilience, hope, and optimism, with a total of 26 questions and options.

2.2.2. Questionnaire Survey Method

The questionnaire survey method is based on the methodology of positivism and belongs to the category of quantitative research. The specific implementation process includes designing a standardized questionnaire, selecting research subjects for distribution, systematically organizing the collected questionnaires, and using statistical analysis methods to process the data, ultimately drawing research conclusions.

2.2.3. Randomized Intervention Experiment

The randomized intervention experiment method has been widely used in recent years in fields such as economic research, policy formulation, and educational reform. Compared to traditional non-experimental research methods in economics, the randomized intervention experiment method is recognized as the "gold standard" in the field of impact evaluation due to its ability to accurately identify causal relationships between variables. After completing the experimental design, the method mainly includes three key implementation stages: baseline survey, random allocation of samples for intervention, and evaluation survey.

2.3. Research Procedure and Plan

This study was guided by positive psychology theory in designing the experimental plan [3]. Using positive psychological intervention methods, the experiment was conducted from four dimensions: optimism, hope, self-efficacy, and resilience. The intervention effects were tracked through community check-ins, aiming to cultivate students' positive psychological qualities [4][5]. In the first stage, we conducted a "positive quality test" on 4,384 college students at a university. In the second stage, based on the first stage survey, 480 students were randomly selected and divided into a control group and an experimental group for the experiment. By establishing a positive

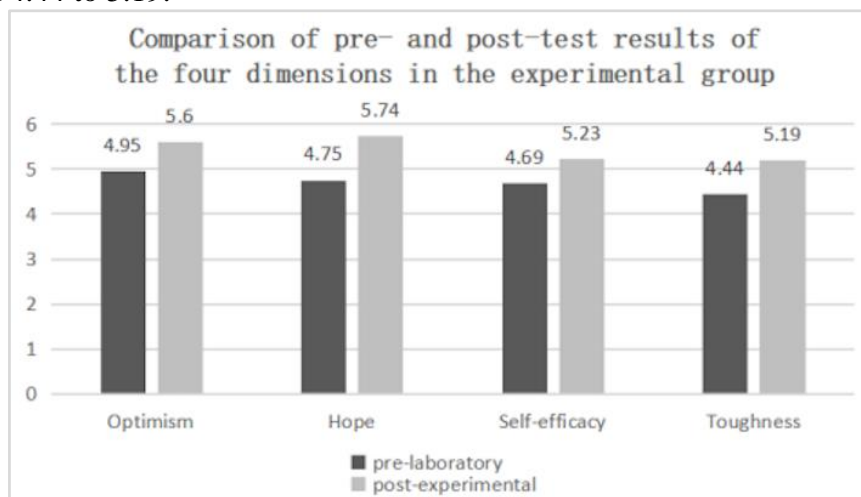
psychological quality training camp, the peer supervision power among group members was fully utilized to monitor the effects. The experimental group received daily online information interventions on different themes, including optimism, hope, self-efficacy, and resilience. The detailed intervention plan is shown in Table 2.

3. Experimental Results

After ten weeks of online positive psychological intervention, this study obtained raw experimental data. To ensure the accuracy of the analysis results, the data were first processed to remove outliers, including extreme values, and then analyzed from multiple dimensions.

3.1. Pre- and Post-Test Results of the Experimental Group's Positive Psychological Qualities

The research results show that the experimental group students showed significant improvement in all dimensions of positive psychological qualities. According to Figure 1, after the intervention, the students' average scores in the optimism dimension increased from 4.95 to 5.6, in the hope dimension from 4.75 to 5.74, in the self-efficacy dimension from 4.69 to 5.23, and in the resilience dimension from 4.44 to 5.19.

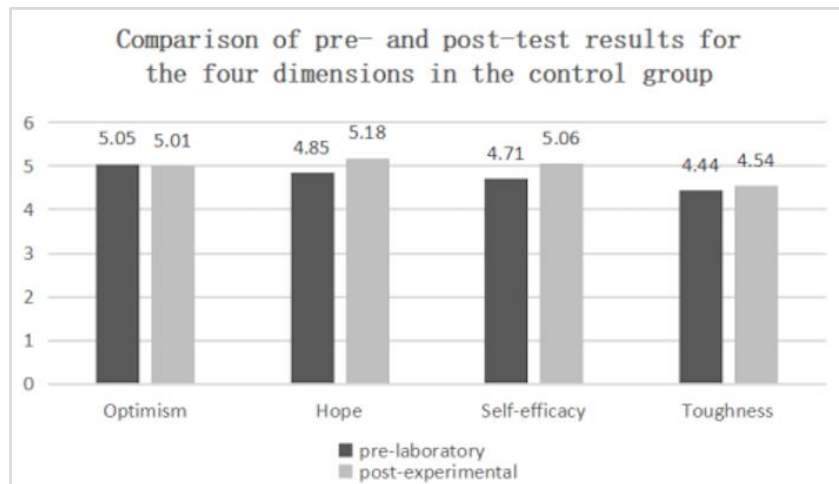


Source: Author survey

Figure 1: Analysis of the experimental results of pre-and-post-test results for the four dimensions in the experimental group

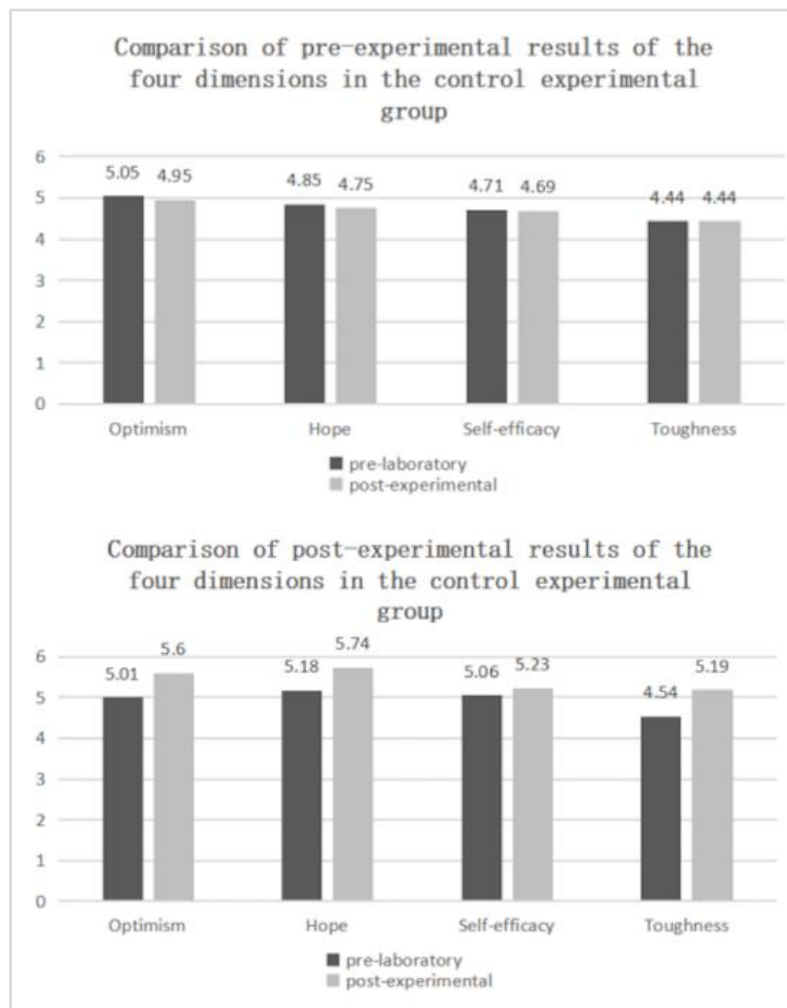
3.2. Pre- and Post-Test Results of the Control Group's Positive Psychological Qualities

The research results show that the control group students showed a slight improvement trend in positive psychological qualities. As shown in Figure 2, during the experimental period, the control group students' average scores in the optimism dimension slightly increased from 5.05 to 5.01, in the hope dimension from 4.85 to 5.18, in the self-efficacy dimension from 4.71 to 5.06, and in the resilience dimension from 4.44 to 4.54. The slight changes in each dimension may be related to a series of public welfare activities organized by the school during the experimental period, such as sports meets and Green Earth activities, which alleviated students' academic stress to some extent and promoted their mental health development. It is worth noting that compared to the experimental group, the improvement in the control group was relatively limited. This comparison result further confirms the significant effect of systematic positive psychological intervention in improving students' psychological qualities.



Source: Author survey

Figure 2: Analysis of the experimental results of pre- and post-test results for the four dimensions in the control group



Source: Author survey

Figure 3: Analysis of the experimental results of the four dimensions of positive psychological qualities

3.3. Comparison of Pre- and Post-Test Results of Positive Psychological Qualities between the Experimental Group and the Control Group

The research data show that the positive psychological levels of the two groups of students were basically the same before the experiment. As shown in Figure 3, although the control group's average scores in the optimism, hope, and self-efficacy dimensions were slightly higher than those of the experimental group, the difference was not significant and was within the normal fluctuation range. However, after the experimental intervention, the positive psychological qualities of the two groups of students showed significant differences. As shown in the figure, the experimental group students' average scores in all four dimensions of positive psychological qualities were significantly higher than those of the control group. This significant improvement may be due to the multiple effects of the experimental intervention: first, it cultivated a positive attitude towards life in students; second, it strengthened students' positive personality traits; and third, it enhanced students' ability to experience positive emotions. These factors worked together to ultimately promote the overall improvement of students' positive psychological qualities.

4. Explanation of Experimental Results

The positive psychological intervention experiment conducted in this study adopted an information intervention model and a community check-in mode. On one hand, through information intervention, students' thinking was subtly influenced by using beautiful life clips and short videos on developing positive thinking habits. This is consistent with the experimental results of existing studies [6][7][8][9], but the difference is that this study adopted an information intervention model using community check-ins. This intervention is not limited to the classroom and can be integrated into students' daily lives, helping students to practice diligently and promoting the intervention experiment to achieve the expected results. Compared to traditional psychological interventions, this method has the advantages of wide coverage, high cost-effectiveness, and strong sustainability, without being limited by time and space.

This experiment tested the positive psychological qualities of college students and collected relevant data, preparing for later experiments. Through interviews with college students, we learned that the reasons for low positive psychological qualities in college students include academic and work pressure, pessimistic development prospects, and family economic environment. In response to these issues, we prepared a positive psychological cultivation plan. Daily short videos and radio programs on "cultivating positive thinking" were released to help students correct negative perceptions of stress and difficulties, encouraging them to develop positive and optimistic cognitive thinking. Positive thinking can help students alleviate stress and improve happiness.

5. Research Value and Prospects

Through the exploration and practice of online cultivation of positive psychological qualities, this study has enriched and enhanced the theoretical connotation and hierarchy of the online cultivation system of positive psychological qualities in college students. At the same time, it has updated and deepened the thinking concepts and methodologies of online cultivation of positive psychological qualities in the new era. At the application level, this study has enhanced the effectiveness and influence of the online cultivation system by increasing participants' engagement and compliance, reducing dropout rates, and improving intervention effects.

To further improve the effectiveness of cultivating positive psychological qualities in college students, this study will further optimize the content and form of the online cultivation system of positive psychological qualities in college students. By comparing the effects of online and offline

intervention plans, the best intervention strategies will be explored to form an authoritative and effective intervention paradigm, thereby better fulfilling the requirements and tasks of college mental health education.

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