The Current Psychological Health and Self-Confidence of College Students Post-Pandemic

Xinxin Jing\textsuperscript{1,2}, a Xunbing Shen\textsuperscript{1,2, b, *}

\textsuperscript{1}Key Laboratory of Psychology of TCM and Brain Science, Jiangxi Administration of Traditional Chinese Medicine, Jiangxi University of Chinese Medicine, Nanchang, Jiangxi Province, China

\textsuperscript{2}Department of Psychology, Jiangxi University of Chinese Medicine, Nanchang 330004, Jiangxi Province. China

*Corresponding Author: Xunbing Shen
\textsuperscript{a} hope6goldsuc@163.com; \textsuperscript{b} shenxunbing@yahoo.com

Abstract. In the post-pandemic era, the relationship between college students' psychological health and self-confidence is crucial for developing targeted educational strategies and interventions. This study explores this relationship by analyzing data collected from 606 respondents, with 439 valid questionnaires returned. Utilizing the General Health Questionnaire (GHQ-20) and the Youth Student Confidence Questionnaire (YSCI), the study reveals a departure from previous findings, indicating that male college students exhibit significantly higher scores on the depression scale compared to female students. This insight contributes valuable empirical evidence to the existing body of research, offering a timely perspective on fostering self-confidence and psychological well-being among college students in the current context.

Keywords: College Students, Self-Confidence Levels, Psychological Health

1 Introduce

Since the outbreak of COVID-19 in 2020, the pandemic has had a profound impact on society, affecting politics, economy, and public health. It has posed unique challenges for young people, especially college students, affecting their mental health significantly [1]. With the lifting of COVID-19 prevention measures in China on January 8, 2023 [2], the need to address the ongoing psychological impacts, particularly on college students' self-confidence, has become urgent. Self-confidence, as a cornerstone of psychological health [3], plays a pivotal role in how individuals face challenges, adapt to changes, and recover from setbacks [4]. The unique context of the pandemic, with its blend of social isolation, academic disruptions, and general uncertainty, calls for a reevaluation of traditional mental health paradigms and support systems. Fresh insights into fostering self-confidence among college students are essential for promoting mental well-being and aiding in the adjustment to the new normal of post-pandemic life.
Research in China, spearheaded by scholars like Bi Chongzeng, Huang Xiting, and Che Liping, has extensively explored self-confidence's concept [5,6], structure, and its link to personality and psychological health. These studies underline the significance of self-confidence in shaping college students' mental health. Globally, the research narrative often focuses on how self-confidence correlates with academic success, mental well-being, and career aspirations [7]. Western studies reveal that high self-confidence is associated with better academic performance and lower anxiety.

The pandemic has exacerbated challenges for students, underlining the importance of understanding and enhancing self-confidence for their psychological health. Research indicates that boosting self-confidence can help students navigate life's challenges more effectively, promoting mental well-being [8]. This examination of self-confidence and psychological health among college students is critical in the post-pandemic era. It not only offers insights into overcoming pandemic-induced challenges but also emphasizes the need for strategies to bolster students' self-confidence, facilitating their personal and psychological growth. Post-pandemic, significant variances in self-confidence and psychological health among college students are expected, potentially differing from pre-pandemic observations, influenced by demographic factors.

2 Research Methodology

2.1 Participants

This study employed a combination of literature review and survey research methods. Questionnaires were distributed randomly to students across all grades from freshman to fifth year. The process of distributing and collecting questionnaires spanned one week, yielding 606 responses, of which 439 were deemed valid, resulting in a response rate of 72%.

In the current survey of 439 student participants, females represented 64% (n=281) of the sample, while males accounted for 36% (n=158). The majority of respondents came from non-only child families, comprising 84.5% (n=371) of the sample, with only children making up 15.5% (n=68). Regarding the nature of household registration, students from rural areas constituted the majority at 76.3% (n=335), compared to 23.7% (n=104) from urban areas. In terms of holding student leadership roles, 58.5% (n=182) of the students had served as student leaders, whereas 41.5% (n=257) had not.

2.2 Instruments

General Health Questionnaire (GHQ-20): Consisting of 20 items, this questionnaire includes subscales for self-affirmation, depression, and anxiety. Scores from the self-affirmation subscale are inversely converted and combined with scores from the depression and anxiety subscales to yield a total score, indicating overall physical and mental health status. A higher total score suggests lower levels of health and well-being. For this study, the questionnaire's Cronbach's alpha was 0.641 [9].

Youth Student Confidence Inventory (YSCI): This 33-item questionnaire covers dimensions such as achievement, interpersonal relations, qualities, coping, and
intelligence. Utilizing a 5-point scoring system, higher scores indicate greater levels of self-confidence. The Cronbach's alpha for this instrument was 0.955 in the current study [5].

3 Research Results

3.1 Self-Confidence Status:

The study reveals that college students' overall self-confidence scores are moderately high, with an average total score of 123.95, which is above the theoretical median. The ranking of confidence dimensions from lowest to highest is interpersonal, achievement, quality, intelligence, and coping [10]. Particularly, coping confidence, indicating students' ability to deal with challenges and setbacks, stands out as an area for potential enhancement through scenario-based learning (see Table1).

Table 1. The total score of self-confidence level and the average score and standard deviation of each factor (N=439)

<table>
<thead>
<tr>
<th>Dimension</th>
<th>Theoretical Median</th>
<th>Mean</th>
<th>Standard Deviation</th>
<th>Percentage Below Theoretical Median</th>
</tr>
</thead>
<tbody>
<tr>
<td>Achievement Confidence</td>
<td>24</td>
<td>30.48</td>
<td>4.83</td>
<td>11.16%</td>
</tr>
<tr>
<td>Intellectual Confidence</td>
<td>29</td>
<td>33.31</td>
<td>4.817</td>
<td>20.96%</td>
</tr>
<tr>
<td>Coping Confidence</td>
<td>19.5</td>
<td>21.71</td>
<td>3.905</td>
<td>27.33%</td>
</tr>
<tr>
<td>Quality Confidence</td>
<td>16</td>
<td>18.83</td>
<td>2.744</td>
<td>18.22%</td>
</tr>
<tr>
<td>Social Confidence</td>
<td>16.5</td>
<td>19.62</td>
<td>2.71</td>
<td>10.71%</td>
</tr>
<tr>
<td>Total Confidence Score</td>
<td>110</td>
<td>123.95</td>
<td>16.744</td>
<td>18.91%</td>
</tr>
</tbody>
</table>

The study on college students' self-confidence levels found significant gender differences, with males generally displaying higher confidence in achievements, intellect, and coping abilities. No significant differences were noted based on grade level or family residence location. However, students who held leadership roles showed significantly higher self-confidence across all dimensions compared to their peers. The impact of being an only child on self-confidence was not significant. These results suggest that while certain demographics like gender and leadership roles influence self-confidence levels, others such as grade level, residence location, and being an only child do not (see Table2,3).
Table 2. Test of Gender Differences in College Students’ Confidence Levels

<table>
<thead>
<tr>
<th>Dimension</th>
<th>Male (M±SD)</th>
<th>Female (M±SD)</th>
<th>t</th>
<th>P</th>
</tr>
</thead>
<tbody>
<tr>
<td>Achievement Confidence</td>
<td>31.27±5.27</td>
<td>30.04±4.52</td>
<td>2.59*</td>
<td>0.010</td>
</tr>
<tr>
<td>Intellectual Confidence</td>
<td>34.23±5.44</td>
<td>32.79±4.35</td>
<td>3.04**</td>
<td>0.003</td>
</tr>
<tr>
<td>Coping Confidence</td>
<td>22.42±4.23</td>
<td>21.31±3.66</td>
<td>2.90**</td>
<td>0.004</td>
</tr>
<tr>
<td>Quality Confidence</td>
<td>19.04±3.02</td>
<td>18.72±2.57</td>
<td>1.21</td>
<td>0.231</td>
</tr>
<tr>
<td>Social Confidence</td>
<td>19.61±2.99</td>
<td>19.63±2.54</td>
<td>-0.06</td>
<td>0.952</td>
</tr>
<tr>
<td>Total Confidence Score</td>
<td>126.58±19.03</td>
<td>122.47±15.15</td>
<td>2.33*</td>
<td>0.024</td>
</tr>
</tbody>
</table>

Table 3. Examination of Differences in Self-Confidence Among Students with Leadership Roles

<table>
<thead>
<tr>
<th>Dimension</th>
<th>Male (M±SD)</th>
<th>Female (M±SD)</th>
<th>t</th>
<th>P</th>
</tr>
</thead>
<tbody>
<tr>
<td>Achievement Confidence</td>
<td>24</td>
<td>30.48</td>
<td>4.83</td>
<td>11.16%</td>
</tr>
<tr>
<td>Intellectual Confidence</td>
<td>29</td>
<td>33.31</td>
<td>4.817</td>
<td>20.96%</td>
</tr>
<tr>
<td>Coping Confidence</td>
<td>19.5</td>
<td>21.71</td>
<td>3.905</td>
<td>27.33%</td>
</tr>
<tr>
<td>Quality Confidence</td>
<td>16</td>
<td>18.83</td>
<td>2.744</td>
<td>18.22%</td>
</tr>
<tr>
<td>Social Confidence</td>
<td>16.5</td>
<td>19.62</td>
<td>2.71</td>
<td>10.71%</td>
</tr>
<tr>
<td>Total Confidence Score</td>
<td>110</td>
<td>123.95</td>
<td>16.744</td>
<td>18.91%</td>
</tr>
</tbody>
</table>

3.2 Psychological Health Status

Students exhibit a low overall level of psychological health, with scores indicating lower self-affirmation and higher levels of depression and anxiety than theoretical medians. This suggests that the pandemic has negatively impacted students' psychological well-being (see Table 4).

Table 4. Overall Levels of Psychological Health

<table>
<thead>
<tr>
<th>Dimension</th>
<th>Theoretical Median</th>
<th>Mean</th>
<th>Standard Deviation</th>
<th>Percentage Below Theoretical Median</th>
</tr>
</thead>
<tbody>
<tr>
<td>Self-Affirmation</td>
<td>4</td>
<td>4.3</td>
<td>2.222</td>
<td>34.40%</td>
</tr>
<tr>
<td>Depression Scale</td>
<td>-1</td>
<td>-0.36</td>
<td>1.236</td>
<td>32.35%</td>
</tr>
<tr>
<td>Anxiety Scale</td>
<td>0</td>
<td>0.87</td>
<td>1.397</td>
<td>37.13%</td>
</tr>
<tr>
<td>Psychosomatic Health</td>
<td>-5</td>
<td>-3.78</td>
<td>3.637</td>
<td>2.73%</td>
</tr>
</tbody>
</table>
The analysis of gender differences in the psychological health of college students revealed significant differences in depression scores between males and females, with no substantial differences noted in self-affirmation, anxiety, or overall psychosomatic health scores (see Table 5).

Table 5. Examination of Gender Differences in Students' Psychological Health

<table>
<thead>
<tr>
<th>Dimension</th>
<th>Male (M±SD)</th>
<th>Female (M±SD)</th>
<th>t</th>
<th>P</th>
</tr>
</thead>
<tbody>
<tr>
<td>Self-Affirmation</td>
<td>4.31±0.18</td>
<td>4.29±0.13</td>
<td>0.10</td>
<td>0.921</td>
</tr>
<tr>
<td>Depression Scale</td>
<td>-0.15±0.11</td>
<td>-0.47±0.07</td>
<td>2.63**</td>
<td>0.009</td>
</tr>
<tr>
<td>Anxiety Scale</td>
<td>0.92±0.11</td>
<td>0.85±0.08</td>
<td>0.51</td>
<td>0.611</td>
</tr>
<tr>
<td>Psychosomatic Health</td>
<td>-3.54±0.30</td>
<td>-3.91±0.21</td>
<td>1.02</td>
<td>0.306</td>
</tr>
</tbody>
</table>

Male students' scores on the depression scale were significantly higher than those of female students, indicating that male college students experienced higher levels of depression than females. This observation slightly diverges from earlier research findings, which typically show higher depression levels in women compared to men. It implies that, in the aftermath of the COVID-19 pandemic, the factors contributing to depression among male college students may be on the rise, and these students might face challenges in timely expressing their depressive feelings [11].

4 Discussion

In examining the impact of the COVID-19 pandemic on college students' self-confidence and psychological health, our findings reveal a landscape marked by moderate self-confidence levels with significant room for improvement, particularly in coping abilities. This suggests the potential of scenario-based learning as an intervention to bolster students' resilience in facing challenges, a critical skill in both academic and personal spheres. Furthermore, our analysis underscores the pronounced influence of gender and leadership roles on self-confidence, with males and students in leadership positions reporting higher levels of confidence. This observation calls for a nuanced approach in designing self-confidence enhancement programs, taking into consideration the demographic factors that influence these levels. Engaging in leadership activities emerges as a promising avenue for boosting self-confidence among students.

The post-pandemic era has unveiled a concerning decline in students' overall psychological health, characterized by reduced self-affirmation and elevated depression and anxiety levels. This alarming trend necessitates a robust response from educational institutions, emphasizing the need for comprehensive mental health support services on campus. Particularly noteworthy is the shift in the traditional gender paradigm regarding depression, with male students reporting higher levels of depression in the wake of
the pandemic. This change, possibly driven by intensified employment competition and evolving societal expectations, highlights the urgency for targeted mental health interventions for male students. It also accentuates the importance of fostering an environment that supports open dialogue about mental health challenges, transcending gender stereotypes. These findings illuminate the complex interplay between self-confidence, psychological health, and demographic factors in the post-pandemic landscape, offering a roadmap for targeted interventions to support college students' well-being.

5 Conclusion

The research highlights the impact of the COVID-19 pandemic on college students' self-confidence and psychological health. It reveals a moderately high level of self-confidence among students, with coping confidence identified as a key area for enhancement. Gender differences significantly affect self-confidence levels, while leadership roles positively influence it across all dimensions. Psychological health appears compromised, showing lower self-affirmation and higher depression and anxiety levels.

Acknowledgment

This study was supported by the 14th five-year planning project of Jiangxi Education Science (No. 23ZD031)

References