



## **Post-Pandemic Paranoia among Selected College Students**

*Dr. Frederick Edward T. Fabella*

FEU Roosevelt, Cainta, Rizal, Philippines

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### **ABSTRACT**

Studies have stated that many people suffered in an atmosphere of uncertainty across the world due to the COVID-19 pandemic. And the mental health of students has been affected detrimentally across the globe. This study attempted to explore paranoia as another possible result of the stressful environment that students underwent. Fifty-nine (59) volunteer-respondents were conveniently sampled from 4<sup>th</sup> year college students from a private school in the Province of Rizal, Philippines. The Green et al. Paranoid Thought Scales (GPTS), a 32-item, 5-point Likert scale instrument, which measures the two domains of ideas of social reference and ideas of social persecution, were administered on the respondents. The findings indicate that the respondents somewhat entertain thoughts of social reference while they rarely entertain thoughts of social persecution. Majority of the respondents obtained GPTS scores below the clinical mean for both ideas of social reference and ideas of social persecution. The same is true for their overall total GPTS scores. However, 22.03% obtained GPTS scores above the clinical mean which suggest that these respondents may require further professional testing and diagnosis for paranoia. A statistically significant and strong positive correlation between the respondents' GPTS ideas of social reference and ideas of social persecution scores was established.

**Keywords:** *College students, mental health, paranoia*

### **INTRODUCTION**

It was revealed in 2022 that the epidemic had impacted young people's mental health and that they were disproportionately more likely to engage in suicidal and self-harming activities. Stressors that can cause melancholy and anxiety include loneliness, fear of illness, suffering and death for oneself and loved ones, bereavement, and financial concerns<sup>1</sup>.

Psychological symptoms were found to be adversely affected by less physical activity, low social support perceptions and a dysfunctional household. During the COVID-19 epidemic, college students frequently experienced acute stress, anxiety, and depressed symptoms. These symptoms also significantly increased beyond the outbreak's early phase. Some college students showed delayed or chronic symptoms, particularly those with the risk factors mentioned above<sup>2</sup>.

A thorough search turned up 15 articles, all of which demonstrated that the pandemic and lockdown measures had an adverse effect on young people, leading to anxiety, stress, sadness, event-specific distress, a decline in psychological wellness, and changes in sleeping patterns. The review highlights the pandemic outbreak's detrimental psychological effects as well as young people's increased susceptibility to developing psychological distress<sup>3</sup>.

Acute stress, anxiety, and depressed symptoms were common during the COVID-19 pandemic, according to a large-scale survey of 821,218 college students in China. About 45% of the participants reported these issues. Numerous psychological and epidemiological elements, including family members having the disease, widespread media coverage, a lack of social support, the senior year, and previous mental health issues, have been linked to an increased likelihood of mental health issues<sup>4</sup>.

However, according to a study, after the COVID-19 widespread quarantine in 2020, there was no decline in the mental health state of Chinese incoming undergraduate students compared to the baseline measures in 2019. Both the quantity and quality of sleep improved, as did the signs of worry<sup>5</sup>.

The bidimensional model of mental health, which presupposes the existence of a negative (symptoms of psychopathology) and a positive (well-being and flourishing) dimension, was used in a study to examine the mental health of university students in the Philippines. It was discovered that anxiety of contracting COVID-19 is solely negatively correlated with students' mental health. On the other hand, students reported financial hardships as a result of the pandemic are linked to both their positive (lower well-being) and negative (more symptoms) mental health<sup>6</sup>.

In a cross-sectional study, 1,141 college students in the Philippines were examined. The fact that 40.2% of respondents reported having poor mental health suggests that the COVID-19 epidemic has most likely had a negative impact on students' mental health and well-being<sup>7</sup>.

One article asserts that the Filipino youth's mental health issues may have gotten worse as a result of the Covid-19 pandemic. 84% of kids expressed concern for both themselves and their families. It is believed that the pandemic has even caused a rise in the suicide rate among young people<sup>8</sup>.

Nearly one in five young Filipino people, ages 15 to 24, had thought about taking their own lives. This is one of the main conclusions of the Young Adult Fertility and Sexuality Study (YAFSS), which was conducted in 2021. It is the fifth in a line of national surveys on Filipino adolescents conducted by the University of the Philippines Population Institute (UPPI) and supported by the Department of Health (DOH). The study, which involved 10,949 randomly chosen young people between the ages of 15 and 24, looked at two groups of mental health indicators, namely depressed symptoms and suicidal thoughts and behaviors, which the YAFS study has observed since 2002. The percentage of young people who have ever had suicidal thoughts or attempted suicide more than doubled between 2013 and 2021. These sobering findings show that today's youth are less mentally healthy than they were a few decades ago<sup>9</sup>.

Furthermore, the Philippine National Center for Mental Health received 2,413 calls in 2019 about mental health issues and 712 calls about suicide. 2,841 calls relating to suicide and 8,176 to mental health issues increased in 2020. The number of calls about suicide doubled to 5,167 in 2021, while the number of calls about mental health increased to 9,730. There were a startling 2,147 attempted suicides and 404 real suicide deaths during the school year 2021–2022. The primary factor blamed for the decline in the mental health of Filipinos, particularly millennials and Gen Z, was the Covid-19 pandemic. The aftereffects on mental health continue to be concerning. Because of the perceived cost of therapy and the stigma associated with mental health, many Filipinos do not report mental health problems or even seek care, and numerous studies continue to highlight the fact that "today's youth have poorer mental well-being than in the last few decades." Thirty-one (31) percent of those polled in this study said they are terrified of being labeled as "crazy" or weak (30 percent) if they seek help or simply report their mental health problems, despite the fact that there has been a 97.2 percent increase in reports of serious depression among young people<sup>10</sup>.

Although many of the more common mental health issues, such as depression, anxiety and stress have been studied extensively, paranoia is a mental health concern that has scarcely been investigated as a result of the aftermath of the COVID-19 pandemic.

Adolescence can be a difficult time because of self-consciousness, a greater concern for peer acceptability, and a fear of being rejected. Unpredictable social encounters, both online and offline, magnify interpersonal problems. This social and developmental environment may be favorable for the genesis of paranoia. An 801-student school cohort that was representative of the population took tests for paranoid as well as a variety of affective, cognitive, and social characteristics. Paranoid thoughts were found to be quite prevalent, distributed continuously, and hierarchically organized. There was a general paranoid component along with conspiracy worries, social anxieties, and physical threat anxieties as subfactors. Teenage years are characterized by a continuum of paranoia, and sporadic suspicions are typical at this time. Depression and anxiety are intimately related to paranoia and may be primary factors in its emergence<sup>11</sup>.

It has been demonstrated that a rise in mental health problems is related to the extraordinary stress brought on by the pandemic's social isolation. A typical mental process that serves as a protection against imagined social threats is paranoid ideation. Higher frequencies of paranoid ideation were seen in females and youths from lower socioeconomic position in a study with a sample of 1516 Portuguese youths. The primary indicators were found to be linked to shame feelings, unfavorable childhood experiences and subservient behaviors<sup>12</sup>.

A thinking process known as paranoia makes you exhibit an unjustified mistrust or suspicion of other people. Paranoid individuals may believe they are being targeted or are being persecuted. Even though there is no danger to them, individuals could feel threatened with physical injury. Constant tension or worry brought on by beliefs about others, mistrust of others, feeling disbelieved or misunderstood, feeling victimized or persecuted when no threat exists, and isolation are only a few symptoms. Relationships and interactions with others can be challenging due to a lack of confidence in other people and ongoing anxiety, which can lead to issues in both personal and professional relationships. People who suffer from paranoia may believe that people are trying to hurt them physically or psychologically, or even stealing from them. They could be antagonistic or disconnected, making it difficult to collaborate with others, which isolates an individual. The exact cause of paranoia is unknown. Genetics, stress and brain chemistry could all have a role<sup>13</sup>.

In view of the foregoing, there is clearly a dearth of studies on the incidence of paranoia among young people and among college students in particular. This study attempted to address this gap by conducting a study on college students using the Green et al. Paranoid Thought Scales (GPTS)<sup>14</sup>.

Specifically, this study sought to address the following research questions:

1. What are the GPTS scores of the respondents in terms of

1.1 ideas of social reference; and

1.2 ideas of social persecution?

2. Is there a significant relationship between the respondents' ideas of social

reference and ideas of social persecution?

3. What is the percentage of respondents whose GPTS scores are above the clinical mean?

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## METHODOLOGY

Fifty-nine (59) volunteer-respondents were conveniently sampled from 4<sup>th</sup> year college students taking up Hospitality Management, Education and Business Administration at a private school in the Province of Rizal, Philippines. The respondents had a mean age of 23.34. There were 17 males and 42 females whose residences include Rodriguez in Rizal, Marikina City, San Mateo in Rizal, Antipolo City, Cainta in Rizal, Manila, Pampanga and Angono in Rizal. The Green et al. Paranoid Thought Scales (GPTS), a 32-item, 5-point Likert scale instrument, which measures the two domains of ideas of social

reference (items 1-16) and ideas of social persecution (items 17-32)<sup>14</sup>, were administered on the respondents. The authors of the GPTS, were able to establish clinical means for those who have been diagnosed with paranoia. These clinical means were utilized by this study to determine whether a respondent's GPTS score was below or above the same.

## RESULTS

The following tables and figures present the data gathered and the statistical treatments utilized.

Table 1. Scale of Interpretation for the GPTS Item Weighted Means

Item weighted mean range	Verbal interpretation
1.000 – 1.800	Not at all
1.801 – 2.600	Rarely
2.601 – 3.400	Somewhat
3.401 – 4.200	Often
4.201 – 5.000	Totally

Table 2. GPTS - Ideas of social reference

Item	Item Weighted Mean	Verbal Interpretation
1. I spent time thinking about friends gossiping about me	2.525	Rarely
2. I often heard people referring to me	2.559	Rarely
3. I have been upset by friends and colleagues judging me critically	2.848	Somewhat
4. People definitely laughed at me behind my back	2.746	Somewhat
5. I have been thinking a lot about people avoiding me	2.441	Rarely
6. People have been dropping hints for me	2.339	Rarely
7. I believed that certain people were not what they seemed	3.695	Somewhat
8. People talking about me behind my back upset me	3.102	Somewhat
9. I was convinced that people were singling me out	2.475	Rarely
10. I was certain that people have followed me	2.509	Rarely
11. Certain people were hostile towards me personally	2.458	Rarely
12. People have been checking up on me	3.088	Somewhat
13. I was stressed out by people watching me	2.949	Somewhat
14. I was frustrated by people laughing at me	2.949	Somewhat
15. I was worried by people's undue interest in me	2.542	Rarely
16. It was hard to stop thinking about people talking about me behind my back	2.780	Somewhat
Total Item Weighted Mean	2.750	Somewhat

Table 3. GPTS - Ideas of social persecution

Item	Item Weighted Mean	Verbal Interpretation
17. Certain individuals have had it in for me	2.576	Rarely
18. I have definitely been persecuted	1.915	Rarely
19. People have intended me harm	1.898	Rarely
20. People wanted me to feel threatened, so they stared at me	2.339	Rarely
21. I was sure certain people did things in order to annoy me	3.170	Somewhat
22. I was convinced there was a conspiracy against me	2.254	Rarely
23. I was sure someone wanted to hurt me	2.356	Rarely
24. I was distressed by people wanting to harm me in some way	2.254	Rarely
25. I was preoccupied with thoughts of people trying to upset me deliberately	2.102	Rarely
26. I couldn't stop thinking about people wanting to confuse me	2.170	Rarely
27. I was distressed by being persecuted	2.000	Rarely
28. I was annoyed because others wanted to deliberately upset me	2.373	Rarely
29. The thought that people were persecuting me played on my mind	2.220	Rarely
30. It was difficult to stop thinking about people wanting to make me feel bad	2.441	Rarely
31. People have been hostile towards me on purpose	2.407	Rarely
32. I was angry that someone wanted to hurt me	2.661	Somewhat
Total Item Weighted Mean	2.321	Rarely

Figure 1. GPTS - Ideas of social reference Bar Graph of Scores

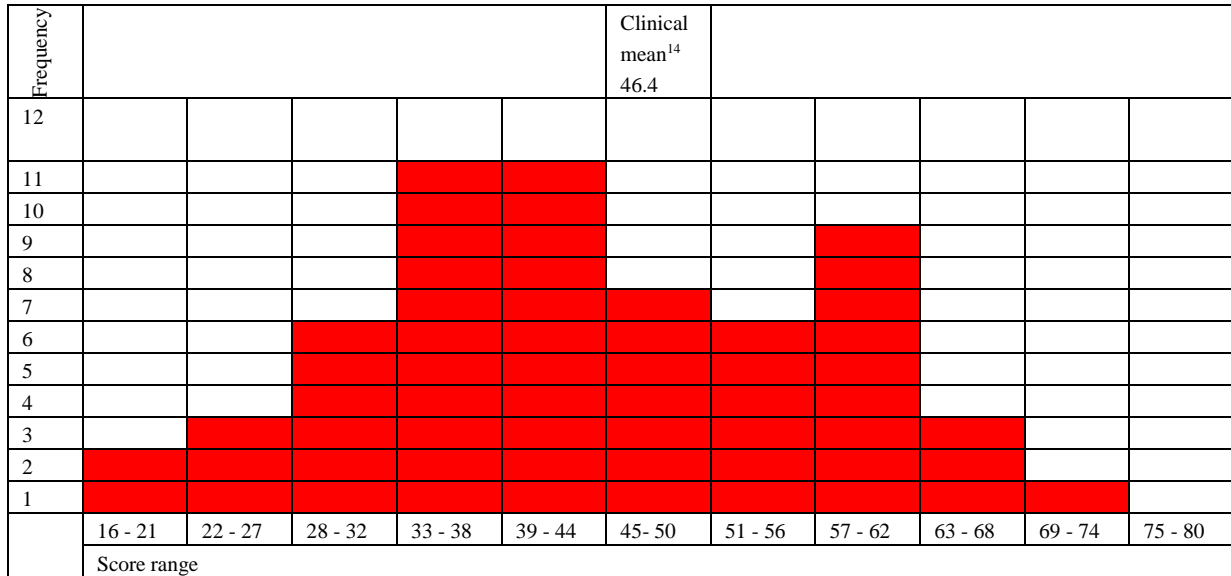


Figure 2. GPTS - Ideas of social persecution Bar Graph of Scores

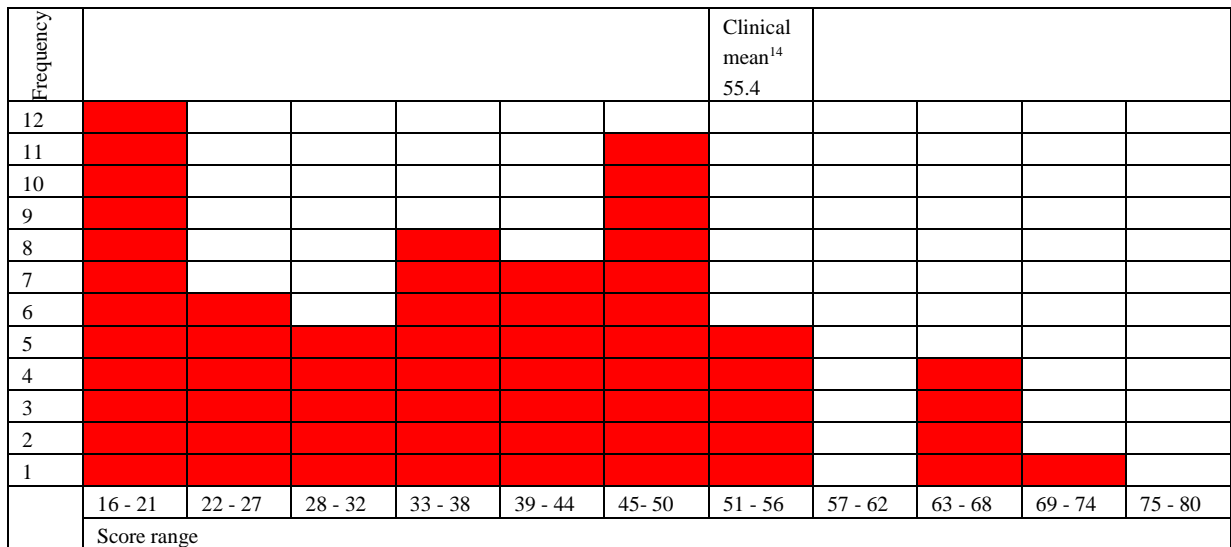


Figure 3. Combined GPTS - Ideas of social reference + Ideas of social persecution Bar Graph of Scores

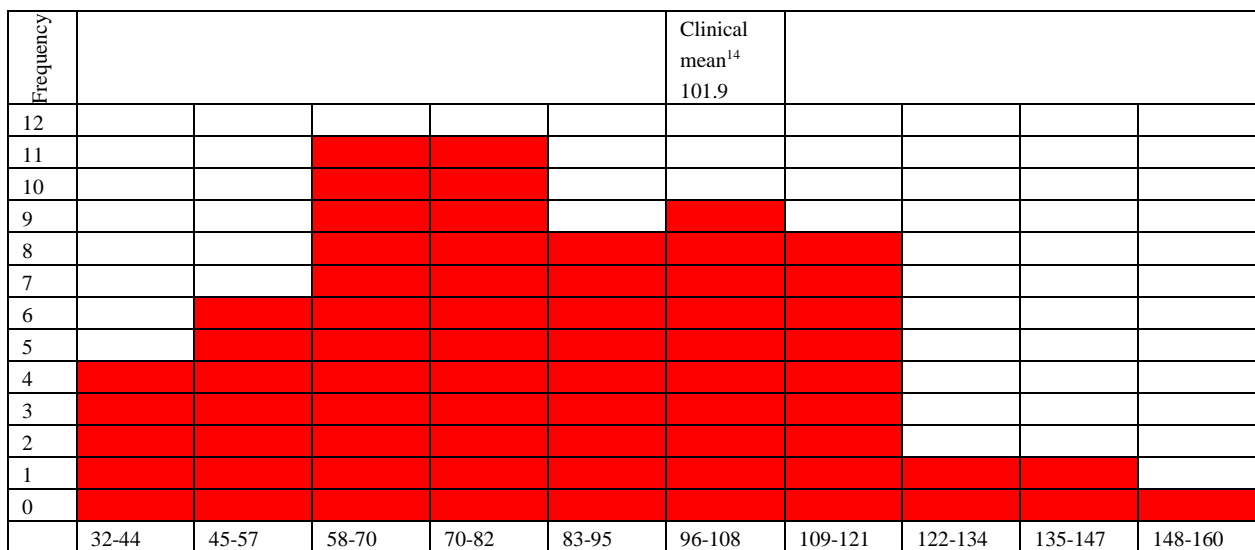


Table 4. Number of Respondents Above and Below the GPTS Clinical Mean

GPTS Domain	Clinical Mean <sup>14</sup> (Based on scores of people with persecutory delusions)	Number of Respondents below the clinical mean	Number of Respondents above the clinical mean
Ideas of social reference	46.4	35	<b>24</b>
Ideas of social persecution	55.4	53	<b>6</b>
Total GPTS score	101.9	46	<b>13 (22.03%)</b>

Figure 4: Scatter plot of respondents' GPTS ideas of social reference and ideas of social persecution scores

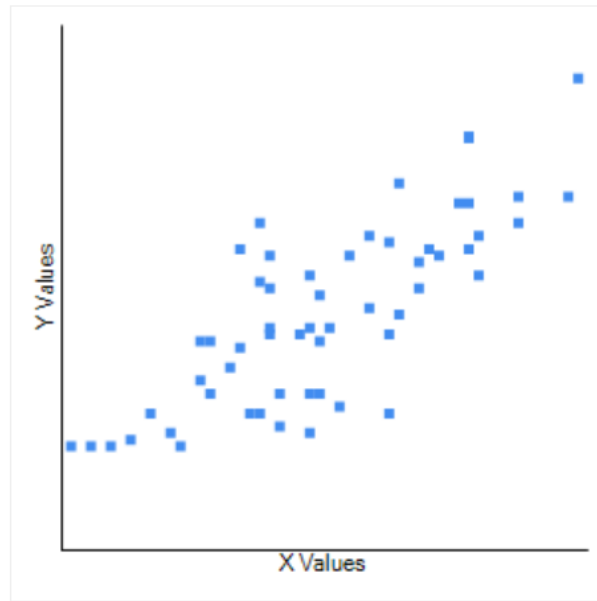


Table 5. Relationship between Respondents' GPTS ideas of social reference and ideas of social persecution scores

Pearson r computation	
X Values Σ = 2596 Mean = 44 Σ(X - Mx) <sup>2</sup> = SSx = 8606	X and Y Combined N = 59 Σ(X - Mx)(Y - My) = 8132
Y Values Σ = 2191 Mean = 37.136 Σ(Y - My) <sup>2</sup> = SSy = 12154.915	R Calculation $r = \frac{\sum((X - Mx)(Y - My))}{\sqrt{(SSx)(SSy)}}$ $r = 8132 / \sqrt{(8606)(12154.915)} = 0.7951$
Meta Numerics (cross-check) r = 0.7951	
The P-Value is < .00001. The result is significant at p < .05.	

## DISCUSSION

The GPTS ideas of social reference item weighted means are presented in Table 2. A total weighted mean of 2.750 was obtained which has a verbal interpretation of *somewhat*. On the other hand, Table 3 presents the item weighted means for the GPTS ideas of social persecution. A total weighted mean of 2.321 was computed which has a verbal interpretation of *rarely*.

Figure 1 shows the frequency of respondents who obtained scores in the GPTS ideas of social reference as distributed among the different score ranges. It can be observed that the ranges with the highest frequencies are from 33-38 and 39-44 with a frequency of 11 each.

Alternatively, Figure 2 presents the frequency of respondents who obtained scores in the GPTS ideas of social persecution as distributed among the different score ranges. It can be noted that the range with the highest frequency are from 16-21 with a frequency of 12.

For the combined GPTS scores of the respondents, Figure 3 presents the distribution of the frequency of scores according to the different score ranges. It can be seen that the ranges between 58-70 and 70-82 have the highest frequencies of 11 each.

Based on the clinical means as set by the GPTS authors, Table 4 presents the number of respondents above and below these means. For ideas of social reference, 24 respondents obtained scores above the clinical mean. As for ideas of social persecution, 6 respondents obtained scores above the clinical mean. For the overall total GPTS, 13 respondents or 22.03% got scores above the clinical mean.

Figure 4 presents the scatter plot of the respondents' GPTS ideas of social reference and ideas of social persecution. Upon ocular inspection alone, there appears to be a clear upward direction from left to right, which suggests a possible positive relationship between the two scores.

The observed trend in Figure 4 was confirmed using a Pearson  $r$  computation between the respondents' GPTS ideas of social reference and ideas of social persecution scores. An  $r$  value of 0.7951 was obtained and with a  $p$  value of less than .00001, it can be inferred that there is a statistically significant and strong positive correlation between these two scores of the respondents.

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## Conclusions

The GPTS ideas of social reference scores imply that the respondents somewhat entertain thoughts of social reference. Whereas, the respondents' GPTS scores of social persecution suggest that the respondents rarely entertain thoughts of social persecution.

Majority of the respondents obtained GPTS scores below the clinical mean for both ideas of social reference and ideas of social persecution. The same is true for their overall total GPTS scores.

An  $r$  value of 0.7951 was obtained and with a  $p$  value of less than .00001, based on the Pearson  $r$  computation between the respondents' GPTS ideas of social reference and ideas of social persecution scores. This means that there is a statistically significant and strong positive correlation between these two scores of the respondents.

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## Recommendations

Although a large majority of the respondents exhibited normal GPTS scores, the result of this study is somewhat alarming since 22.03% of the respondents produced scores above the clinical mean. Despite the fact that the respondents' identities are unknown, the higher education institution to which the respondents belong should seek them out for further testing and professional diagnosis. In addition, a mental wellness program should be promoted for the benefit of its students.

Similar research should be conducted on larger samples and in different higher education institutions to ascertain the level of mental health of students. And if similar results are found, then studies should also be conducted to determine the reasons or causes of these GPTS scores.

## Ethical Declaration

The researcher declares that this study strictly adhered to the ethics of research. Informed consent was obtained, freedom to withdraw at any time from the study was made known to the participants, their identities were anonymized, the participants were not exposed to any physical, psychological or social harm and the results were used for research purposes only. The researcher further ensured steps to prevent bias in the interpretation of the data. This research was self-funded and there was no conflict of interest in the conduct of the study.

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