

THE EFFECT OF EXPRESSIVE WRITING ON STRESS LEVELS IN FINAL-LEVEL BACHELOR OF APPLIED NURSING STUDENTS AT THE POLTEKKES KEMENKES SURABAYA

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Abstract

Final-year university students often experience high academic stress due to the pressure of completing final projects, meeting deadlines, and fulfilling academic expectations, making them vulnerable to psychological distress. Preliminary observations showed that 54% of students experienced moderate stress and 46% severe stress, indicating a significant impact on mental well-being. Expressive writing, a technique that encourages individuals to express thoughts and emotions through structured writing, is known to reduce psychological tension. This study used a pre-experimental one-group pre-test post-test design with 109 final-year students selected through purposive sampling. Expressive writing was the independent variable, while stress levels were measured using the Student-Life Stress Inventory (SLSI). The intervention consisted of four sessions conducted over two weeks. Before the intervention, most students had moderate to severe stress levels. After completing the sessions, a noticeable reduction in stress was observed. Statistical analysis using the Wilcoxon signed-rank test showed a significant difference between pre- and post-intervention scores ($p = 0.000$; $p < 0.05$), confirming the effectiveness of expressive writing in reducing academic stress. These findings indicate that expressive writing helps students process emotions, improve psychological regulation, and develop healthier coping strategies. Therefore, it can be recommended as a practical, low-cost method for final-year students to manage academic stress.

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INTRODUCTION

Stress is a recurrent phenomenon in daily life that is essentially inescapable for every individual (1). Academic stress in final year students is a psychological and physiological response that arises when academic demands exceed the individual's ability or resources to cope (2). According to Fitriani, stress is a very common problem for final year students due to the processes they go through and the demands placed on them to complete their education on time (3). Final year students who experience stress are at risk of suicide due to the fear of failure in completing their final assignments and the many demands they face (4).

According to the WHO, the prevalence of stress remains considerably high, as approximately 350 million individuals across the globe are affected by stress. Data from East Java shows that 1.8% of students experience high levels of academic

stress, 64.5% experience moderate stress, and 33.6% experience low levels of stress (5).

The stress experienced by students in the final stages of their studies is caused by various external and internal demands that arise during the process of writing their final assignments, which ultimately impact their mental state. This is reflected in symptoms of anxiety disorders, such as excessive worry, fear, and even panic in response to the inability to meet the demands of being a final-year student (1). External factors that can contribute to academic stress include standard of living, educational attainment, social support, and daily stressors. Meanwhile, internal factors that influence academic stress relate to an individual's personality, including aspects such as emotions, psychological control, optimism, and coping strategies (6). According to Ulfa et al, academic stress can cause

several negative impacts, such as decreased learning motivation among students, decreased academic achievement, and delayed graduation (7). Furthermore, the stress experienced by students not only impacts the students' psychology but also impacts bodily functions and behavior, such as sleep patterns and mental well-being, thus affecting the students' academic lives (8).

In Hatmanti's research results with nursing students as subjects, the researcher provided writing therapy intervention, with the results obtained that most respondents wrote about their complaints during the lecture process, starting from conflicts with friends, piling up assignment deadlines, conflicts with lecturers regarding lecture schedules, so that the study showed that writing therapy was able to reduce stress in students (9). Furthermore, Rhamadani's research on the subject of Final Year Students of Mulawarman University Samarinda used a descriptive design research method. The results obtained were that the Murottal Al-Qur'an intervention applied to Final Year Students of Mulawarman University Samarinda was able to reduce stress caused by students working on compiling KTI (10). Then, the results of Siti Azizah's research, which involved active final semester students of the Faculty of Psychology, Makassar State University, using a pretest-posttest control group research design in the experimental and control groups, showed that the expressive writing intervention applied to these students was effective in reducing academic stress levels (6). Then, in Mardatari's research, it was explained that after being given expressive writing therapy, there was a significant decrease in the level of social anxiety tendencies among students from the Faculty of Psychology, Merdeka University, Malang (10). Although various studies have demonstrated the effectiveness of expressive writing in reducing academic stress among university students, empirical evidence focusing specifically on final-year applied nursing students in Indonesia remains limited. Previous research has largely involved students from psychology or general academic programs, or has examined nursing students using pre-experimental designs with limited sample sizes and institutional scope (9)(6). Furthermore, several studies conducted in Indonesia have explored alternative stress management interventions, such as religious or auditory therapies, rather than expressive writing as a standalone

intervention (10). As applied nursing students face distinctive academic pressures, including clinical practice requirements and competency-based graduation demands, findings from other student populations may not be directly generalizable. This lack of context-specific empirical evidence highlights a clear research gap regarding the effectiveness of expressive writing among final-year applied nursing students in Indonesia.

Therefore, the present study is explicitly designed to address this gap by examining the effect of expressive writing on academic stress levels among final-year applied nursing students. By focusing on this specific population within the Indonesian context, this study aims to contribute empirical evidence that may support the development of effective, low-cost, and easily implemented interventions for managing academic stress in applied nursing education.

METHODS

This study employed a pre-experimental design using a one-group pretest–posttest approach without a control group. The study population consisted of 130 final-year undergraduate students in the Applied Nursing program at Poltekkes Kemenkes Surabaya, with 109 respondents selected through purposive sampling. The inclusion criteria were: 1. respondents who were conscious and able to communicate effectively, and 2. those who were willing to participate and signed the informed consent form. The exclusion criteria included respondents who were ill during the study period or absent during data collection. Data were collected using the Student-Life Stress Inventory (SLSI), which has been tested for validity and reliability. Gadzella and Baloglu evaluated the instrument's validity and internal consistency reliability using Confirmatory Factor Analysis (CFA), with results indicating acceptable parameters: Goodness of Fit Index (GFI) = 0.99 (>0.90), Adjusted Goodness of Fit Index (AGFI) = 0.99 (>0.90), and Root Mean Square Error of Approximation (RMSEA) = 0.5 (<1.0) (11). Furthermore, (12) reported that the SLSI demonstrated very high internal consistency reliability, with a Cronbach's alpha coefficient of 0.93. The questionnaire was distributed online via Google Forms and shared through WhatsApp. The data collection process was conducted in three stages. In the

preparation stage, the researcher developed the research proposal and obtained permission from Poltekkes Kemenkes Surabaya and the Head of the Nursing Study Program. In the implementation stage, eligible respondents were selected and asked to provide informed consent. Pretest data were collected during the first session using the SLSI questionnaire, followed by an explanation of expressive writing. The intervention was conducted over two weeks in four sessions (10–20 minutes each). During the second and third sessions, participants engaged in expressive writing activities, while in the fourth session, they completed the intervention and filled out the posttest questionnaire.

In the final stage, the data were tabulated and analyzed to compare pretest and posttest results. The research protocol has been approved by the Institutional Review Board of the Surabaya Ministry of Health Polytechnic with No.EA/3809/KEPK Poltekkes_Sby/V/2025 dated August 10, 2025

RESULTS AND DISCUSSION

The age and gender characteristics of 109 final-year Bachelor of Applied Nursing students at the Surabaya Ministry of Health Polytechnic showed that the majority (88%) were female. The final-year Bachelor of Applied Nursing students were in the 21-22 year age range.

Table 1. Distribution of Final Year Students of the Applied Bachelor of Nursing Program at Poltekkes Kemenkes Surabaya Based on Gender and Age

Category		Frequency (n)	Percentage (%)
Gender	Male	13	12
	Female	96	88
Age	21-22 Years Old	109	100

The stress level in final year students of the Applied Nursing Bachelor's degree showed that before being given Expressive Writing, most students experienced moderate stress (54%), and also (46%) students experienced severe stress.

Table 2. Distribution of Results of Stress Levels in Final Year Students of the Applied Nursing Bachelor's Degree at Poltekkes Kemenkes Surabaya Before Being Given Expressive Writing

Category	Pre-Test	
	Frequency (n)	Percentage (%)
Mild Stress	0	0
Moderate Stress	59	54
Severe Stress	50	46
Amount	109	100

Based on the data obtained, before being given expressive writing, the majority of students experienced moderate levels of stress (54%). This condition is influenced by various factors, including self-imposed pressure, concerns about the future, and the demands of completing various coursework and writing a thesis, which contribute to stress in final-year students.

This research aligns with research by Sukarni et al., which explains that almost all final-year students experience stress at the same level, namely moderate stress (13). This research also found that the majority of final-year students completing their theses experienced moderate levels of stress. that stress experienced by final-year students, generally in adolescence, is influenced by biopsychosocial factors, ranging from academic burdens, financial problems, to social conflict (14)(15).

So that in adolescence or final year students experience stress caused by several factors, namely pressure originating from themselves, worries about the future, demands as students to complete various assignments, and the preparation of theses, which cause stress to arise in final year students.

The stress level in final year students of the Applied Nursing Bachelor's degree showed that after being given Expressive Writing, most students experienced moderate stress (62%), while there were also students who experienced mild stress (19%) and severe stress (19%).

Table 3. Distribution of Results of Stress Levels in Final Year Students of Applied Nursing Bachelor's Degree at Poltekkes Kemenkes Surabaya After Being Given Expressive Writing

Category	Post-Test	
	Frequency (n)	Percentage (%)
Mild Stress	21	19
Moderate Stress	67	62
Severe Stress	21	19
Amount	109	100

Based on the data obtained, after being given Expressive Writing, the majority of students experienced moderate levels of stress (62%). This may be due to academic demands, final assignment preparation, poor time management, and social pressure from the environment, which are stressors commonly experienced by final-year students.

This research aligns with research by Hatmanti et al., which found that after being given Expressive Writing, some participants remained at moderate levels of stress. Furthermore, research by Wahyu et al. showed that after being given Expressive Writing therapy, students remained at moderate levels of stress (9)(16).

Expressive writing can help students reduce stress by channeling burdensome feelings and thoughts. However, it is not yet fully capable of reducing stress to a mild level in most individuals. This may occur because each student has a different level of stressors, especially final-year students who are faced with academic demands, final assignments, and pressures about the future. Therefore, I believe that expressive writing can be used as a supporting method in a stress management program for students, especially if provided continuously and combined with other psychological support to achieve optimal results.

The results of the Wilcoxon Signed Rank Test show that Expressive writing has a significant effect on reducing stress levels in final year students of Poltekkes Kemenkes Surabaya, with a p-value of 0.000 smaller than the α value (0.05). Before being given Expressive

writing, the average stress level in final year students was 2.46 with a standard deviation of 0.501. Meanwhile, after being given Expressive writing, the results were obtained with an average of 2.00 with a standard deviation of 0.624.

Table 4. Test Result of the Effect of Expressive Writing on Stress Levels of Final Year Applied Nursing Students at the Ministry of Health Polytechnic of Surabaya using the Wilcoxon Test

Variable	Wilcoxon Signed Rank Test			
	f	Pre Test ($\bar{x} \pm SD$)	Post Test ($\bar{x} \pm SD$)	p-value
Stress Level	109	2.46 ± 0.501	2.00 ± 0.624	.000

The Wilcoxon Signed Rank Test (WRS) showed that expressive writing significantly reduced stress levels in final-year students at the Surabaya Ministry of Health Polytechnic, with a p-value of 0.000, lower than the α value of 0.05. This study aligns with research by Irmayanti & Daud, which demonstrated that expressive writing has been shown to reduce academic stress in students. This finding aligns with the opinion of Hoyt et al., that expressive writing is a psychological intervention that can help reduce the impact of stress, enabling individuals to process and understand their emotions, allowing the body to reduce the stress hormone (cortisol) more quickly after facing pressure (17)(18).

Expressive writing can be a method for reducing stress levels in final-year students due to its significant effect on stress reduction. By writing down emotions and experiences, individuals can better understand what they are going through and feel more relieved. This intervention also helps the body relax by reducing the stress hormone (cortisol) through activation of the parasympathetic nervous system. So, Expressive writing is not only beneficial for feelings, but also good for physical health.

Based on the results of this study, the effect of expressive writing on stress levels indicates that almost all final-year students remain at a moderate level of

stress. This condition can occur because academic demands, final assignment preparation, poor time management, and social pressure from the environment are stressors commonly experienced by final-year students. This aligns with research by Wahyu et al., which showed that after being given expressive writing, students remained at a moderate level of stress. Furthermore, research by Hatmanti et al. explained that after being given expressive writing, some participants remained at a moderate level of stress (16)(9).

The persistence of moderate stress is understandable because final-year students generally face various demands, such as a high academic load, the process of writing final assignments, suboptimal time management skills, and pressure from the social environment.

The study also found that students who were previously experiencing severe stress experienced a decrease in stress levels to moderate levels. This change likely occurred due to more adaptive coping strategies or social support received during the completion of the assignment. Expressive writing has the potential to be an effective intervention in helping students manage academic pressure. The possibility of this reduction is not only influenced by the process of expressing emotions through writing, but also by students' ability to develop more adaptive coping strategies and the social support they receive during the final assignment preparation process. Through expressive writing, students can redirect their focus of attention, calm the body's physiological responses, and be in a more relaxed state, so that heavy emotional burdens can gradually be reduced (19)(20).

On the other hand, some students initially experienced moderate stress levels that later decreased to mild stress. This could be due to their ability to manage themselves and their emotions, as well as support from family and peers, which can play a crucial role in helping them reduce their stress levels. This aligns with research by Nursolehah & Rahmiati, which found that several respondents who experienced moderate stress levels

decreased to low levels after being given Expressive Writing (19).

The reduction in stress levels from moderate to mild indicates that the success of Expressive Writing is strongly influenced by students' ability to manage themselves and their emotions. Support from family and peers also plays a crucial role in providing a sense of security and helping students cope with academic pressure. With the combination of Expressive Writing, good emotional management, and a supportive social environment, students are better able to relieve stress and achieve a more stable psychological state.

Meanwhile, some students experience moderate stress after being given Expressive writing, which increases to severe stress. This can occur due to facing increasingly complex academic demands, the tiring process of compiling final assignments, poor time management skills, and social pressure from the environment that adds to the mental burden. These conditions cause moderate stress levels to increase to severe stress levels. This study is in line with the research of Adhriani et al., which explains that Expressive writing carried out in several consecutive days does not always show a consistent decrease in psychological distress. This shows that Expressive writing is not always effective in reducing severe stress or psychological crises in all students, depending on individual conditions such as self-efficacy, external pressure, and contextual factors (21).

The increase in stress from moderate to severe in a small number of students after receiving expressive writing may be due to a high academic load and poor emotional management skills. If students are unable to recognize or express emotions effectively, the benefits of expressive writing are diminished. Therefore, the effectiveness of this method is highly dependent on the individual's personal circumstances and does not always produce the same results for all students.

CONCLUSION

This study demonstrates that expressive writing has a significant effect in reducing academic stress levels among final-year Bachelor of Applied Nursing students at Poltekkes Kemenkes Surabaya. Before the intervention, most students experienced moderate to severe stress. After four sessions of expressive writing, there was a statistically significant reduction in stress levels ($p < 0.05$), with some students decreasing from severe to moderate stress and from moderate to mild stress. These findings indicate that expressive writing is effective in helping students manage emotions and reduce psychological pressure.

The implication of this study is that expressive writing can be recommended as a practical, easy-to-implement, and low-cost intervention to help final-year students manage academic stress. Nursing education institutions may consider integrating this method into student support programs or mental health services. However, since academic stress is multifactorial, expressive writing should be combined with other interventions to achieve more optimal outcomes.

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