

ACADEMIC PROCRASTINATION ON THE ACADEMIC FAILURE ATTRIBUTION OF STUDENTS AS MEDIATED BY TEACHER PROFESSIONAL DEVELOPMENT

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ABSTRACT

This study aims to determine the levels of academic procrastination, failure attribution, and teacher professional development among basic education students in Lianga I District, Surigao del Sur, and explore their interactions. Utilizing a quantitative descriptive-correlational research design, the study involved 320 elementary, junior high, and senior high school students who responded to the modified questionnaires on procrastination, failure attribution, and teacher professional development. The findings suggest that students exhibited a moderate level of procrastination, with their failure attributions substantially correlated with their propensity to delay tasks or fear of non-completion. Notably, many students attributed their academic failures to factors beyond their control, such as believing they lack intelligence, have poor memory, possess little talent, or have a limited natural capacity for academic pursuits. Regarding teacher professional development, the findings revealed strengths in several areas but highlight the need for improvement in questioning techniques, teaching models, the learning environment, and time management. Although teacher professional development significantly influenced student procrastination, its role as a mediator between procrastination and failure attribution was not evident. These findings are crucial for enhancing educational strategies within the district. Improving teacher efficacy through targeted training could reduce procrastination and reshape students' perceptions of their failures, potentially leading to better academic outcomes. The study emphasizes the need for further research to examine how teacher training affects student behavior and to identify additional factors influencing academic performance.

Keywords: Lianga I District, academic procrastination, failure attribution, teacher professional development, educational outcomes

INTRODUCTION

Academic failure has been a persistent challenge in basic education in the Philippines, with several factors contributing to this issue. According to Likupe and Mwale's (2016) study, low-performing students often attribute their poor performance to external factors, such as chance or task difficulty. They also added that, to avoid blame and maintain unrealistic expectations, students tend to reflect an ego-defensive mindset. Similarly, Alinsunurin (2021) identified students' economic backgrounds and learning mindsets as significant contributors to academic failure, noting that these factors often lead to reading difficulties. In addition, Coloquit (2021) emphasized the significant relationship between issues within the Philippine education system and the academic failure attributions (AFA). Olipas (2024) concurs, emphasizing that although the K-12 curriculum strives to improve education quality, its execution has encountered criticism for its insufficient focus on teacher competency. Subsequently, Barcelo (2019) observed that the implementation of the K-12 curriculum, which struggled with limited resources to adequately support its goals, further exacerbated the situation.

To address these challenges, Almerino et al. (2020) proposed targeted interventions, including enhanced teacher support and improved learning materials, to mitigate the effects of these issues and improve student performance. Similarly, Alvarado (2023b) emphasizes the importance of equipping teachers with strategies to address gaps in syllabus implementation while enhancing students' learning abilities. Also, Calderon (2015) underscores the necessity of further research into attribution styles and the development of targeted interventions to address these challenges effectively. Furthermore, Olipas (2024) pointed out that the recently introduced MATATAG curriculum appears to address some of the challenges posed by the K-12 curriculum, particularly in enhancing foundational skills and prioritizing comprehension and application over rote memorization. He also noted that the positive changes brought about by the MATATAG curriculum, including opportunities for lesson localization and contextualization, can improve educational outcomes.

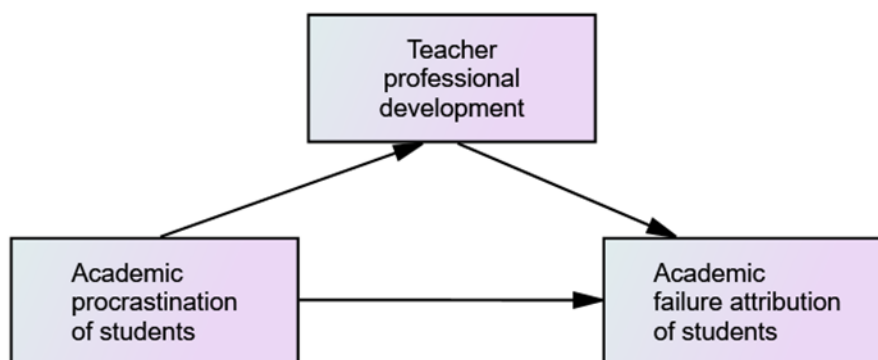
On the other hand, in the Philippine setting, the role of academic procrastination (AP) in academic failure attributions (AFA) has become increasingly important. Research indicates that procrastination has a negative correlation with achievement motivation and a positive correlation with despair (Yildiz & Yildiz, 2016), implying that it may influence how students perceive and justify their academic failures. Furthermore, there is evidence that teacher professional development (TPD) reverses the effect of procrastination on failure attribution. Effective professional development can enhance teachers' knowledge, abilities, and attitudes, leading to modifications in teaching practices that enhance student outcomes and decrease procrastination (Kasmawati, 2020). Aside from that, TPD has a significant impact on students' academic success and failure attribution. Research indicates that teacher quality has a considerable impact on student progress in technical areas (Oviawe, 2020). However, additional research is necessary to gain a deeper understanding of these specific dynamics within the local educational system.

This study's theoretical and conceptual framework shows the relationship between AP and AFA. It emphasizes how TPD plays a role in this connection. The theory and framework are based

on the self-regulation theory (Fleisher, 2005); it highlights the importance of students' self-regulation skills in understanding how procrastination affects their AFA. As demonstrated in the study by Obregon-Cuesta et al. (2022), this research builds upon attribution theory, providing insights into how students attribute the causes of their academic challenges. This theory concentrates on whether students perceive their locus of control as the cause of their failure.

Figure 1

Conceptual Framework



Linking concepts, the conceptual framework shown in Figure 1 places the TPD at the center, influencing both the AP and AFA. Based on teacher efficacy theory (Çapa-Aydin et al., 2009), effective professional development can enhance how much teachers value student engagement and help reduce procrastination among students. This intervention highlights a two-way relationship: enhancing teachers' appreciation and support for students through targeted training can address issues like student procrastination while also transforming how students perceive and attribute their academic failures, demonstrating the significant impact of effective teacher training.

However, there is a lack of research on the connection between procrastination and AFA, as well as the role of TPD in the Philippine education system. Previous researches attempted to establish a relationship between delay and hopelessness among student teachers (Yildiz & Yildiz, 2016), nonetheless, other research needs to be conducted to determine the relation between the two elements and the ways that students explain their failure in class. This research gap is an indication that there is need to undertake more elaborative research in this stream.

The reviewed literature underscores the significance of teacher professional development (TPD) in the Philippines, particularly amidst globalization and the full implementation of the K-12 educational system. De Guzman et al. (2005) highlight the need for globalization-oriented approaches in teacher education and examine the challenges faced by educators in adopting such strategies. Additionally, Almerino et al. (2020) and Coloquit (2021) stress the importance of continuously evaluating and improving the educational outcomes of the K-12 curriculum. They advocate for sustained professional development to align education with global and industry

standards, which is vital given the ongoing reforms in the Philippine education system, such as the MATATAG curriculum. This inclusive strategy focuses on enhancing student learning and performance by fostering communicative competence and a strong personal and national identity (Alvarado, 2023b). Collectively, these studies highlight the critical need for further research into targeted strategies and interventions that address educational challenges. Such research could guide teacher education institutions, policymakers, and stakeholders, particularly in the Lianga I District, Surigao del Sur Division, and across the Philippines.

Purpose of the Research

This research aims to explore students' AP across various activities, such as writing reflection papers, preparing for exams, completing weekly reading tasks, performing classroom duties, and engaging in other academic responsibilities. It also examines the students' AFA in relation to controllable and uncontrollable factors, both internal and external. Additionally, the study investigates the impact of TPD on teaching practices, including lesson orientation, question-asking, modeling, real-world application of lessons, time management, and assessment methods. The relationships between AP, AFA, and TPD are analyzed, with a particular focus on whether TPD mediates the connection between AP and AFA. The research addresses the hypothesis that there is no significant correlation among these variables and that TPD does not serve as a significant mediator.

METHODOLOGY

This study used a quantitative descriptive-correlational research approach to investigate how students in Lianga District associate AP to expressing their AFA, with a focus on how TPD influences this relationship. It investigated how variables vary from one another (Lazaraton, 2005). Furthermore, correlational research makes it easy to discover how various factors are related because it helps to determine the breadth of an issue (Srihari, 2021). Furthermore, the study explores how the TPD mediates procrastination behaviors and their reasons for academic failure, adding a picture of the mediating methods drawn by Judd and Kenny (1981).

Respondents of the Study

The study included three hundred twenty primary and secondary school students enrolled in Lianga I District, Surigao del Sur Division, during the school year 2023-2024. In selecting the participants, researcher employed maximum likelihood estimation to calculate the sample size by following Jackson's (2003) $N; q$ criterion, which specifies a ratio of 20 responders per indicator, given that this study includes three variables and sixteen indicators. Based on the ratio set, the sample size is 320.

Following prior studies' recommendations for sample size and stratified random sampling, the 320 students were considered reliable respondents due to their direct experiences with procrastination, academic failure, and the impact of TPD. The researcher separated the sample into three categories: elementary, junior high, and senior high school pupils. The researcher selected elementary pupils from grades 5 and 6, whose ages ranged from 11 to 12 years old. Junior and senior high school students ranged in age from 13 to 18 years old. The total participant count

was 193 elementary pupils (96 males and 97 females), 100 junior high students (50 boys and 50 females), and 27 senior high students (10 males and 17 females). Everyone who took part agreed to join in the study after receiving approval from school administrators, advisers, and parents.

Research Instruments

The data required were obtained via a structured questionnaires, which was physically delivered to the participants. The data for this study were gathered using the Solomon and Rothblum assessment Scale (1984), the AFA Scale developed by Obregon-Cuesta et al. (2022), and the TPD Scale developed by Bozkuş and Bayrak (2019). Adapted questionnaires have been proven dependable and accurate for assessing APA, AFA, and TPD, respectively. The AP Assessment Scale has 16 items designed to assess procrastination tendencies in specific academic activities, including writing reflection papers, exam preparation, catching up on weekly reading assignments, completing classroom assignments, reading library books, and other academic duties. The AFA Scale, consisting of 18 items, evaluates how students connect their academic failures to various factors. A 24-item scale known as the TPD Scale assesses students' perceptions of their teachers' professional development in classroom management and technology integration. Furthermore, each of these modified questions employed a 5-point Likert scale.

The contextualized questionnaire was validated by five specialists from the Lianga I District to determine its validity. The comments provided by the reviewers on the instrument's relevance, comprehensibility, and overall quality were appropriately considered. An additional expert from Lianga II district, who shares the same qualifications and attributes, confirmed the content, structure, and pertinence of the questionnaire to the research objective, as recommended by Creswell (2021). To guarantee questionnaire reliability, the researcher conducted a pilot test with 30 respondents in Lianga II district and analyzed the results using Cronbach's alpha. All instruments showed high reliability, including the AP Assessment Scale (alpha = 0.93), AFA scale (alpha = 0.91), and TPD scale (alpha = 0.915). These data support the consistency and reliability of measures for AP, AFA, and TPD in Lianga I district.

Data Analysis

The data gathered were evaluated and treated using several statistical tools. The mean was utilized to assess the levels of AP among students, their AFA, and the extent of TPD. Pearson's *r*, a correlation coefficient, was employed to determine the significant relationships between students' AP and their AFA scale, students' AP and TPD, and students' AFA and TPD. Additionally, regression analysis was used to measure the influence of AP and TPD on the AFA of students. The Sobel *z*-test was applied to establish the mediating effect of TPD on the relationship between students' AP and their AFA scale.

Ethical Considerations

The study addressed several potential ethical issues, including obtaining informed consent, ensuring confidentiality and privacy, allowing voluntary participation, minimizing harm and discomfort, avoiding deception, maintaining equity and fairness, and obtaining institutional review board (IRB) approval. These measures ensured that the study was responsibly utilized, respecting the rights and well-being of participants.

RESULTS AND DISCUSSION

Level of Academic Procrastination (AP) of Students

The data shown in Table 1 indicate that all students within the district have a moderate overall AP level. Subsequently, the activities of reading books borrowed from the library exhibit the lowest mean score of 2.90, while the general academic tasks provide the greatest mean score of 3.02; however, they remain at a moderate level. The standard deviation exhibits minimal variations among all activities. The data suggest a consistent and unchanging level of procrastinating behavior among students. The observed trend of moderate but fluctuating procrastination across various tasks is consistent with the findings of Fentaw et al. (2022), who proposed that the level of procrastination can differ based on the specific academic activities under consideration, including writing assignments, oral presentations, exam preparation, group work, and library activities.

Table 1

Level of Academic Procrastination (AP) of Students in Lianga I District

	Std. Deviation	Mean	Descriptive Level
Writing term paper	0.77	2.93	Moderate
Studying for exam	0.85	2.98	Moderate
Keeping up with weekly reading assignments	0.99	2.91	Moderate
Performing administrative task	0.80	2.97	Moderate
Reading books bowered from library	0.87	2.90	Moderate
Performing academic tracts in general	0.90	3.02	Moderate
Overall	0.70	2.95	Moderate

Level of the Academic Failure Attribution (AFA) Scale

Table 2 presents the distribution of AFA levels among the students in Lianga District, indicating a moderate level. The data suggests that students attributed their failure to internal factors, with

the highest average score of 2.93, but its descriptive level is moderate. By comparison, the attributions to uncontrollable external influences are notably lower, with a mean of 2.47 and classified as low. The standard deviations of 0.80 indicate moderate heterogeneity in these findings. However, the overall variance remains minimal, which implies that students have a common perspective of the reasons behind their academic failures. This trend supports the findings of Banks and Woolfson (2008), who observed that students, particularly those with difficulty with learning, often attribute their academic difficulties to uncontrollable internal factors such as insufficient innate ability or poor memory, suggesting an ongoing tendency towards negative self-attribution.

Table 2

Level of the AFA Scale in Lianga I District

	Std. Deviation	Mean	Descriptive Level
Controllable internal attributions	0.84	2.66	Moderate
Uncontrollable internal attributions	0.95	2.93	Moderate
Uncontrollable external attribution	0.80	2.47	Low
Overall	0.67	2.69	Moderate

Level of Teacher Processional Development (TPD)

Table 3 demonstrates that the TPD in Lianga I District is effective, with a high descriptive mean of 3.59 in configuration. The indicator of learning environment has the lowest mean score of 3.03 and a moderate descriptive level, indicating that there is still room for improvement. The overall mean score is 3.42 TPD, which is high based on its descriptive level, indicating that a solid framework has been built despite the score's diversity, which shows variances in the influence of many areas for improvement. Moderate standard deviations indicate both agreement and diversity in student experiences with teacher classroom instruction. This example shows that, while the district's teacher professional development is good, implementing targeted changes in key areas could improve its effectiveness. This is consistent with Usman's (2012) recommendation to focus on key areas to strengthen the impact of professional development on student outcomes.

Table 3*Level of Teacher Professional Development (TPD) in Lianga I District*

	Std. Deviation	Mean	Descriptive Level
Orientation	0.97	3.57	High
Configuration	0.99	3.59	High
Questioning	0.81	3.37	Moderate
Teaching Modeling	0.95	3.38	Moderate
Application	0.83	3.47	High
Learning environment	0.87	3.03	Moderate
Time management	0.89	3.28	Moderate
Assessment	0.91	3.63	High
Overall	0.69	3.42	High

A Significant Relationship Between Levels of AP and AFA Scale of Students

The correlation analysis of AP and AFA among Lianga I District students, shown in Table 4.1, reveals that the two variables are statistically significant. All p-values fall below the 0.05 level. There is not enough proof to prove that the null hypothesis is true. This statistical significance is especially associated with the overall association between general procrastination activities and overall failure attributions, as well as specific behaviors like writing term papers and fulfilling administrative responsibilities.

These data show a persistent pattern in which more procrastination is associated with stronger attributions to both controllable and uncontrollable internal and external factors, implying that procrastination has a major impact on students' academic self-perception. This study is relevant to multiculturalism through the perspective of student culture because it implies that diverse cultural groups may have diverse patterns of motivational variables and factors that influence academic achievement. Yockey and Kralowec (2015) discovered disparities in procrastination behavior among ethnic groups, with Asian international students being more prone to procrastinate because of acculturative stress coping techniques. This pattern is also similar with Abdi Zarrin and Gracia's (2020) findings, which found fear of failure and self-regulation as important predictors of AP.

Table 4.1*A Significant Relationship Between AP and AFA of Students in Lianga I District*

AP of students	AFA of students			Overall
	Controllable internal attributions	Uncontrollable internal attributions	Uncontrollable external attribution	
Writing term paper	.329**	.295**	.246**	.375**
	0.000	0.000	0.000	0.000
Studying for exam	.344**	.327**	.210**	.382**
	0.000	0.000	0.003	0.000
Keeping up with weekly reading assignments	.238**	.274**	0.13	.281**
	0.001	0.000	0.067	0.000
Performing administrative task	.254**	.342**	.358**	.411**
	0.000	0.000	0.000	0.000
Reading books bowered from library	.288**	.140*	.193**	.264**
	0.00	0.048	0.006	0.00
Performing academic tracts in general	.397**	.315**	.258**	.418**
	0.000	0.000	0.000	0.000
Overall	.400**	.339**	.258**	.430**
	0.000	0.000	0.000	0.000

The statistical analysis in Table 4.2 demonstrates a strong link between AP and various aspects of TPD in the Lianga I District. The correlations are particularly strong in areas such as orientation, configuration, and assessment across academic behaviors. The results prove that teacher ability can significantly impact student procrastination, and there is insufficient evidence to support the null hypothesis. Research findings suggest that the connections between teacher behaviors, such as questioning and instructional modeling, and student involvement are complex, exhibiting diverse yet noteworthy correlations. Valenzuela et al. (2017) substantiate the correlation between teachers' pedagogical competence and student procrastination, suggesting that enhancing teaching abilities could potentially reduce student procrastination.

Table 4.2

A Significant Relationship Between AP and TPD in Lianga I District

Academic Procrastination of students	Teacher Professional Development								Overall
	Orienta tion	Config uration	Questio ning	Teachi ng Modeli ng	Applica tion Learnin g environ ment	Applica tion Learnin g environ ment	Time manage ment	Assess ment	
Writing term paper	0.126	.214**	0.108	0.106	0.075	0.073	0.128	0.118	.157*
	0.075	0.002	0.127	0.136	0.293	0.302	0.072	0.095	0.027
Studying for exam	.319**	.310**	.271**	.217**	.216**	.189**	.265**	.284**	.339**
	0.000	0.000	0.000	0.002	0.002	0.007	0.000	0.000	0.000
Keeping up with weekly reading assignments	.238**	.260**	.236**	0.124	.151*	0.125	.208**	.226**	.256**
	0.001	0.000	0.001	0.08	0.033	0.078	0.003	0.001	0.000
Performing administrative task	.339**	.296**	.373**	.226**	.344**	.198**	.352**	.270**	.389**
	0.000	0.000	0.000	0.001	0.000	0.005	0.000	0.000	0.000
Reading books borrowed from library	.269**	.291**	.291**	.278**	.266**	.148*	.238**	.295**	.339**
	0.000	0.000	0.000	0.000	0.000	0.037	0.001	0.000	0.000
Performing academic tracts in general	.313**	.310**	.288**	.231**	.212**	0.134	.251**	.240**	.324**
	0.000	0.000	0.000	0.001	0.003	0.059	0.000	0.001	0.000
Overall	.322**	.350**	.304**	.241**	.233**	.169*	.277**	.296**	.359**
	0.000	0.000	0.000	0.001	0.001	0.016	0.000	0.000	0.000

Table 4.3 shows significant relationships between TPD and the AFA scale among students in the Lianga I District. The data shows strong, statistically significant correlations, particularly in questioning, configuration, and time management, with controllable and uncontrollable internal attributions of failure, where significance levels are largely below the 0.05 threshold, implying that there is insufficient evidence to support the claims of the null hypothesis, which only confirms the rejection of the null hypothesis. These findings show that features of professional growth, such as questioning and assessment approaches, are related to students' internal attributions of academic failures. In contrast, correlations with uncontrollable external attributions are significantly smaller, showing that TPD has a less prominent impact on external causes of educational failure. This pattern emphasizes the importance of targeted professional development in changing students' internal attributions of success and failure, which is consistent with the findings of Ravhuhali et al. (2015), who found that TPD has a considerable influence on student outcomes. Further

research, such as that conducted by Smith and Gillespie (2023), supports the link between teacher efficacy and improved educational results, emphasizing how instructors' self-efficacy influences students' perceptions of competence, respect, effort, and achievement.

Table 4.3

A Significant Relationship between TPD and AFA of Students in Lianga I District

Teacher Professional Development	Academic Failure Attribution Scale			Overall
	Controllable internal attributions	Uncontrollable internal attributions	Uncontrollable external attribution	
Orientation	0.132	.224**	0.038	.176*
	0.063	0.001	0.598	0.013
Configuration	.143*	.262**	0.064	.210**
	0.043	0.000	0.369	0.003
Questioning	.146*	.285**	.144*	.253**
	0.039	0.000	0.042	0.000
Teaching Modeling	0.136	.192**	0.091	.184**
	0.055	0.006	0.202	0.009
Application Learning environment	0.068	.165*	0.104	.148*
	0.335	0.019	0.141	0.036
Application Learning environment	0.079	.223**	.244**	.236**
	0.264	0.002	0.001	0.001
Time management	0.111	.234**	.205**	.239**
	0.116	0.001	0.004	0.001
Assessment	0.027	.171*	0.041	0.109
	0.703	0.015	0.563	0.125
Overall	0.138	.286**	.148*	.252**
	0.051	0.000	0.037	0.000

Significant Mediation of TPD on the Relationship Between AP and AFA Scale of Students

The path analysis in Table 5, Table 5.1, Figures 2, and 3, reveals TPD's involvement as a potential mediator in the relationship between AP students and AFA. In table 5 it shows the significant correlations identified— AP of Students with AFA (coefficient = 0.430, p-value = 0), AP of Students with TPD (coefficient = 0.359, p-value = 0), and TPD with AFA (coefficient = 0.252, p-value = 0)—establish strong direct associations among these variables, indicating meaningful relationships that warrant further mediation analysis.

Table 5

Significance of the Mediation of TPD on the Relationship Between AP of Students and Students' AFA Scale in Lianga I District

Pair	Variable	Correlation Coefficient	p-value	Decision on Ho
IV at DV	AP and AFA of students	.430**	0	Reject
IV at MV	AP and TPD	.359**	0	Reject
MV at DV	TPD and AFA of students	.252**	0	Reject

Figure 2 illustrates a positive association between students' AP and their AFA scale, with a correlation value of 0.48 and a subsequent impact of 0.41. Figure 3 proves that the relationship between AP and AFA of students is partially mediated by TPD. The independent pathway from AP to AFA is more effective (0.38) than the mediated routes through TPD (0.36 from AP to TPD and 0.11 from TPD to AFA), showing that although TPD does have an impact, the direct effect of AP on AFA stays significant.

Figure 2

Relationship Between AP and AFA of Students

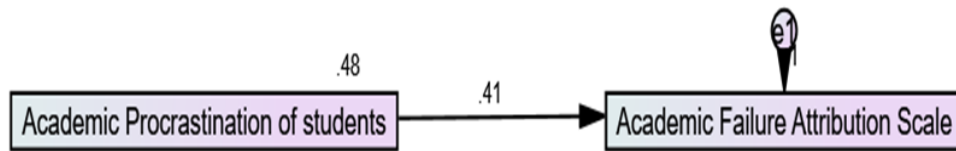


Figure 3

Results of the Mediation Computation

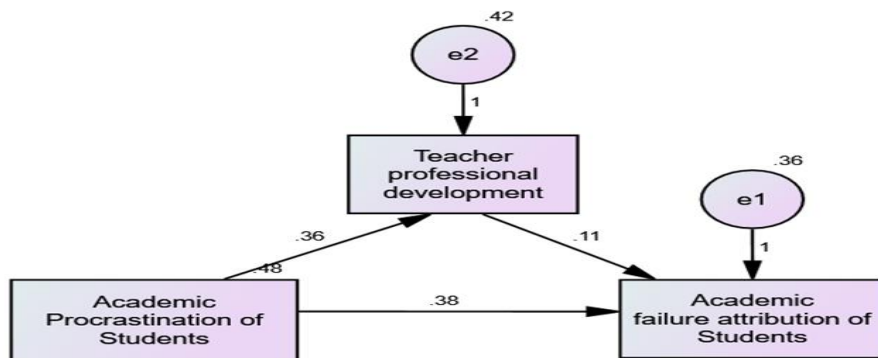


Table 5.1 shows that AP students had a significant direct impact on AFA (estimate = 0.375, $p < 0.001$), even with TPD as a mediator. Although AP of Students strongly predicts TPD (estimate = 0.357, $p < 0.001$), the path from TPD to AFA is positive (estimate = 0.108), but not statistically significant (p -value = 0.10). This finding in table 5.1 implies that TPD does not significantly moderate the effect of students' AP on AFA. When evaluating the mediation, the absence of statistical significance in the mediation path (p -value = 0.1) leads us to keep the null hypothesis about TPD's mediation impact. This finding suggests that, while TPD is strongly associated with both AP of Students and AFA, it does not significantly mediate the relationship, implying that other factors may influence AFA more than TPD.

Table 5.1

No Mediation

			Estimate	SE.	CR.	P	Label
TPD	<---	AP of Students	0.357	0.066	5.422	***	
AFA of students	<---	AP of Students	0.375	0.066	5.73	***	
AFA of students	<---	TPD	0.108	0.066	1.647	0.1	

Extensive research supports these findings, noting the limited role of TPD as a mediator in the procrastination-failure attribution link. Studies point to various other factors, such as the impact of teaching styles on procrastination (Codina et al., 2018), teacher attributions of student failure (Georgiou et al., 2002), and the role of self-efficacy in the relationship between perfectionism and procrastination (Seo, 2008). These suggest that while TPD is crucial, it might not be the sole or primary factor in addressing AP and its consequences.

CONCLUSION AND RECOMMENDATIONS

According to the findings, the students in Lianga I district had a moderate level of academic procrastination (AP) with fewer standard deviations. The nature of the tasks also influences the level of procrastination. Moreover, most students tend to attribute their AFA to internal factors, both controllable and uncontrollable. The Lianga I district's TPD exhibits favorable indicators in specific areas like orientation, configuration, application, and evaluation. However, it necessitates adjustments in areas like questioning, teaching modeling, learning environment, and time management. Additionally, the study found a positive correlation between procrastination and students' reactions to their failures, whether through internal or external attributions. This suggests that procrastination is not only a behavioral issue but also influences students' perceptions of their failures. The path analysis revealed that the effective implementation of TPD strategies leads to a positive impact, reducing procrastination among students. However, the current study failed to establish the mediating role of TPD between procrastination and failure attribution, thereby

necessitating further studies to establish any other variable as a mediator between the two constructs.

With those results, Lianga I District may implement various strategies to enhance students' performance. One strategy may be an organized time management and procrastination awareness seminar for students and teachers. School heads can conduct Learning Action Cell (LAC) sessions to help teachers creatively revise lessons for better student involvement and interaction, which will directly target procrastination behaviors and improve motivation among learners.

Schools in the Lianga I District could prioritize strategies to foster learning self-assertiveness and effective coping mechanisms among students. This includes addressing internal institutional factors, such as promoting student discipline and guiding learners in discovering personalized and effective study techniques. By cultivating these skills, schools can positively influence students' confidence in their abilities and overall academic performance.

In the district, TPD plays an important role in promoting teaching practices by focusing on effective questioning techniques, teacher modeling, and fostering positive classroom environments in teacher training programs. Regular evaluations of these programs are important to promote high standards and ensure they align with the changing learning environment. Teachers' deliberate efforts to train them will significantly enhance students' learning rate and ability, as they foster an environment that promotes academic success.

To sum it up, the primary focus of the intervention should be on the client's behavior and cognitive processes related to organizational and time management skills. This strategy involves employing techniques to enhance time management skills, study skills, and self-executive skills, as well as utilizing psychotherapy to address the underlying fear and emotion that cause procrastination. These strategies may involve organizing a series of seminars to reframe failures as learning opportunities or providing teacher training to teach effective strategies for eliminating procrastination.

On the other hand, TPD serves a purpose, but it does not act as a mediator; the results show that focusing on providing students with educational support and addressing their procrastination tendencies is a direct and efficient approach. Future research could uncover additional factors that mediate the relationship between factors, enabling the development of precise and efficient education interventions.

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