PERCEIVED EFFECTS OF CONTINUING PROFESSIONAL DEVELOPMENT (CPD) AND WORK PERFORMANCE AMONG PUBLIC SECONDARY SCHOOL TEACHERS AS MODERATED BY SEX AND AGE

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ABSTRACT

This research aimed to explore how Continuing Professional Development (CPD) correlates the work performance of public secondary school teachers, in Compostela, Davao de Oro. The study considered factors like sex and age as moderators. It utilized a descriptive-correlational research design to survey secondary public-school teachers during the academic year 2022-2023. The results revealed a correlation between perceived CPD effects and work performance indicating no significant relationship. Additionally, the analysis showed that there were no differences in perceived effects of CPD on work performance when the respondents are grouped according to age. However, there was a significant difference in perceived effects of CPD on work performance when the respondents are grouped according to sex. These findings suggest that although CPD is crucial for development, its perceived impact may not directly influence work performance and age does not seem to play a role in shaping these perceptions. The study suggests that educational stakeholders should consider aspects such as school leadership, classroom resources and student engagement methods to enhance teacher effectiveness. This investigation enhances our comprehension of the role of CPD in education. Underscores the importance of taking an approach, to teacher development.

Keywords: Continuing Professional Development, Work Performance, Public Secondary School Teachers, Moderating Effect, Philippines'

1. INTRODUCTION

Teachers are essential to the functioning of the educational system since they are responsible for determining the academic achievement and personal growth of a large number of students. Their commitment, expertise, and efficiency have a substantial impact on the learning results, educational success, and general well-being of the pupils. That is why teachers undergo the process of learning, acquiring new skills, and enhancing one's knowledge through continuing professional development (CPD). They enhance their professional competencies, remain current with the most recent advancements and best practices, and adapting to changes that occur within their

business or profession. However, Tribunalo and Oritizo (2023) found that teachers are confronted with a multitude of obstacles that can hinder their effectiveness at work. Teachers are required to negotiate a difficult environment that requires them to be resilient, adaptable, and to continuously work on their professional development. This landscape includes enormous workload, administrative requirements, limited resources, and growing education standards. Moreover, as Paz (2021) noted other factors like burnout, job dissatisfaction, and lack of supportive networks and resources can also magnify these issues, which in negates the capacity of teachers perform their professional duties to the optimum levels.

In global perspectives, in Indonesia, Kanya et al. (2021) reveal that among the areas challenging effective teaching learning process and raising teachers' performance one of the major problems is to assess and understand the root causes of teachers' poor performance. These are the problems related to the lack of prepare or inadequate training, lack of subject matter competency, poor classroom management, teacher demoralization or aloofness, and factors beyond the teacher's control such as inequitable distribution of wealth and social status and lack of institutional support. Moreover, Rosser and Fahmi (2019) further agreed that such interaction among personal, professional, and contextual variables added to the difficulty in pinpointing the roots of subpar performance and in designing solutions appropriate to the problems that require intervention.

In a national context, Sarabia and Collantes (2020) in the Philippines enumerated in their research that training institutions, educational leaders, administrators, and legislators have significant challenges in terms of noticing and addressing issues with the teaching profession's inefficiency. It was noted that even though performance assessment systems as well as accountability measures can be applied for the purpose of the evaluation of the efficiency of teachers and identification of the potential for their improvement, such systems can be quite limited, at times unreliable and do not meet the demands of professional development of a teacher. Additionally, in Agusan del Sur, Pama (2023) indicated that below 50 percent poor performance on the part of teachers is manifested in low student achievement, students' disengagement in classrooms, ineffective instructional strategy, and decreased professional and instructor fulfillment.

Given the challenges raised, empirical study on the relationship between professional development and teacher work performance as regulated by sex and age is needed. The researcher can provide evidence-based solutions to increase teacher effectiveness and educational results by studying the facilitators, barriers, and mechanisms by which professional development improves teacher work performance. This research contributes to this body of information by investigating how professional development affects educator work performance in various educational environments. This study identifies promising practices, highlights areas for improvement, and identifies promising practices to provide policymakers, educators, and stakeholders who support teacher professional growth and excellence in teaching and learning with actionable suggestions. The finished work will be shown at academic conferences and submitted for publication to reach more people.

2. METHOD

2.1 Research Design

This study employed a quantitative approach with a descriptive-correlational methodology. According to Creswell (2012), An analysis of phenomena that is carried out in a methodical manner through the collection of measurable data and the application of statistical, mathematical, or computational methods is known as quantitative research. In quantitative research, Williams (2022) added that information that is statistically significant is gathered from already existing customers as well as future customers through the use of sampling techniques and the distribution of online questionnaires, online polls, and surveys, for example. This kind of research is distinguished by the fact that the findings can be presented in numerical form, which is one of its primary qualities.

2.2 Research Locale

The study was conducted in Compostela, Davao de Oro. Compostela is a constituent municipality within the expansive plains of Davao de Oro. The development of the area began prior to World War II, when the region was primarily covered by a forest and inhabited solely by the indigenous Mandayas, who decided to establish their settlements along the riverbanks of the benevolent Agusan River. The origin of Compostela's name is not

documented, but esteemed people speculate that it was a transient Spanish hamlet known as a "Kampo de Kastila" that originated from the Eastern Coast of Davao Oriental. Another account suggests that a Spanish friar from the East Coast arrived to the location, bringing along a statue of Senior Santiago de Apostol, the patron saint of his hometown Compostela, Spain. As a result, the place was named Compostela.

The schools that were involved in this study were the Compostela National High School, Gabi National High School, Maparat National High School, and Mangayon National High School. Compostela National High School is located along Purok 7, Lapu-lapu St., Poblacion, Compostela, Compostela Valley. The three-hectare school site is bounded west by Compostela Central Elementary School and Maputi Creek in the East. It is facing south strategically located along the municipal road while a wide oval field is found in its rear area. Gabi National High School is located at Brgy. Gabi, Compostela, Davao de Oro. It is described as the nurturing ground where knowledge blooms, friendships flourish, and young minds take flight, soaring towards a brighter future. They are the second biggest school in the district. Maparat National High School is a school in Province of Davao de Oro, Davao Region. Maparat National High School is situated nearby to the towns Municipality of Compostela and Montevista. They provide opportunities for their learners to excel in their field through their talents and skills. Mangayon National High School is located at Brgy. Mangayon, Compostela, Davao de Oro. It is described as the sterling standard of leadership and excellence.

2.3 Research Respondents

The respondents of the study were the 161 teachers from the identified four junior high schools of Compostela District, Davao de Oro. From the total teacher population of 275, using the sample size calculator, with confidence level at 95% and precision rate at 0.05, the sample size is 161. In determining the number of teacher-respondents from each identified school, the proportionate stratified sampling technique was used. To select the actual respondents from each school, a simple random sampling through lottery was used. Table 1 shows the distribution of study respondents.

2.4 Research Instruments

In this study, the researcher adapted a questionnaire. This was utilized to determine the level of perceived effects of CPD to the performance of teachers. To determine the level of the perceived effects of the CPD to the secondary public-school teachers, an adapted questionnaire from the study of Tan (2015) entitled Contribution of continuing professional development to career advancement which consisted of 24 items was utilized. The respondents were asked for their agreements to each statement using the 4-Likert scale namely: 4- strongly agree; 3-agree; 2- disagree; and 1- strongly disagree. Below is the scale utilized in determining the level of perceived effects of continuing professional development (CPD) of secondary public-school teachers.

Range	Description	Interpretation
3.50-4.00	Strongly Agree	The perceived effects of CPD are
		always evident.
2.50-3.49	Agree	The perceived effects of CPD are
		oftentimes evident.
1.50- 2.49	Disagree	The perceived effects of CPD are
		sometimes evident.
1.0-1.49	Strongly Disagree	The perceived effects of CPD are
		never evident.

On the other hand, to determine the level of performance of the secondary public-school teachers, the final rating from their Individual Performance Commitment Report Form (IPCRF) was utilized. Below is the scale utilized in determining the level of work performance of the secondary public-school teachers

Range	Description	Interpretation
4.500- 5.000	Outstanding	The work performance always
		meets expectations.
3.500-4.499	Very Satisfactory	The work performance oftentimes
		meets expectations.
2.500-3.499	Satisfactory	The work performance sometimes
		meets expectations.
1.500-2.499	Unsatisfactory	The work performance rarely
		meets expectations.
below 1.499	Poor	The work performance never
		meets expectations.

2.5 Data Collection

For the purpose of this investigation, this research protocol was submitted to the Research Ethics Committee of the Assumption College of Nabunturan for the purpose of checking the ethicality of this paper. After obtaining clearance, a request letter for permission to conduct the study through e-mail to the Senior Education Program Specialist for Research of the Davao de Oro division. After the approval of the division office, a written letter of request to conduct the study has been submitted to the School Principals of Compostela, Maparat, Mangayon and Gabi National High School, Davao de Oro, where the study conducted.

The respondents were briefed on the conduct of the study, its significance, its aim, and its objectives once the study has been approved. The respondents received a comprehensive explanation of each item on the survey questionnaire as well as the individual scale that corresponds to all of the items. In addition to this, the participants are required to sign an Informed Consent Form, which explains that their participation in the study in the study was voluntary. Next, it is essential for the researcher to make sure that the participants are aware of the measures that are taken to maintain their anonymity.

Participants were gathered together in order to provide responses to the survey questions. In the following step, the researcher provided the examination to the individuals who participated in the research during the academic year 2023-2024. In order to collect responses from all of the participants, the survey questions were asked. Counts, computations, and analyses were performed on the results in order to verify and validate the findings of the qualitative data.

2.6 Statistical Treatment of Data

The collected data was analyzed to determine the level of perceived effects of CPD and work performance of secondary public-school teachers as well as the significance of the two variables.

Mean. The mean is a measure of central tendency that indicates the average number. Summing all dataset values and dividing by the total number of values yields it. This was utilized to assess the extent of a teacher's perceived effects of CPD and work performance.

Standard deviation. The standard deviation measures the spread of values around the mean. It measures dataset values' deviation from the mean. This was utilized to compute and demonstrate the magnitude of deviation for the entire group.

Pearson Product Moment Correlation. In the field of statistics, the Pearson correlation coefficient, often known as Pearson's correlation coefficient or Pearson's r, it measures the degree and direction of the linear relationship between two continuous variables statistically. It measures the straightness of two variables' relationships. This study aims to assess the correlation between teacher's perceived effects of CPD and work performance.

ANOVA. This is a statistical formula used to compare variances across the means (or average) of different groups. In this study, age and gender was utilized as the grouping variable to compare.

Independent T-test. An inferential statistical test that determines whether there is statistically significant difference between the means in two unrelated groups.

3. RESULTS

This chapter presents the results and analysis of the study. Tabular and textual forms were used in this chapter in order to present the data well. The results in this study utilized the 0.05 level of significance in terms of the analysis of the inferential results.

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Age	Counts	% of <mark>To</mark> tal	Cumulative %
25-30	34	21.1 %	21.1 %
31-35	37	23.0 %	67.1 %
36-40	24	14.9 %	92.5 %
41-45	29	18.0 %	39.1 %
46-50	17	10.6 %	77.6 %
51-55	12	7.5 %	100.0 %
Over 55	8	5.0 %	44.1 %

Table 1. Demographic Profile of the Secondary Public-School Teachers in terms of Age

The largest age group among teachers is between 31 and 35 years old comprising 37 teachers, which accounts for 23.0% of the workforce. This indicates that a significant number of teachers are relatively young and likely in the stages of their careers. Additionally, the age group of 25-30 years consists of 34 teachers making up 21.1% of the total highlighting the youthful trend in the teaching staff. Together these two age groups represent half (44.1%) of all teachers showing a presence of younger educators.

Following closely behind is the age group of 41-45 years old with 29 teachers representing 18.0% of the workforce. This group, along with those aged between 36-40 (24 teachers totaling 14.9%) demonstrates a number of mid professionals who account for a combined total of 32.9% in the teaching workforce. This distribution suggests a balance between career and mid-career educators which could positively impact mentoring and professional growth within educational institutions.

Male

100.0%

Teachers aged between 46-50 and 51-55 constitute portions of the workforce with respective percentages at 10.6% (17 teachers) and 7.5% (12 teachers). Finally, those, over the age of 55 have eight representatives accounting for 5.0% of all teachers.

The total adds, up to 100% with this group showing a distribution across all age brackets. Additionally, the table depicts a workforce comprising educators alongside a considerable number of mid-career professionals. The lower percentages of age categories hint at retirements, in the near future paving the way for younger teachers to progress and shoulder greater roles. The data portrays a makeup primed for continuous growth as the younger generation accumulates experience and the older generation eases out of the field gradually.

In addition, the second table shows the demographic profile of the secondary public-school teachers in terms of sex. Specifically, it shows data for the number of female and male teachers, its percentage relative to the total and the cumulative percentage.

Sex	Counts	% of Total	Cumulative %
Female	111	68.9 %	68.9 %

31.1%

50

Table 2. Demographic Profile of the Secondary Public-School Teachers in terms of Sex

The breakdown of public-school teachers' demographics as indicated in Table 2 highlights a gender gap, within the profession. The data shows that a significant majority of teachers are women with 111 females making up 68.9% of the teaching staff. This prevalence of teachers reflects a trend in education, where women tend to outnumber men in the workforce. On the hand male teachers constitute a percentage with only 50 individuals accounting for 31.1% of the total. When considering both genders the combined percentages add up to 100% emphasizing this gender imbalance and signaling areas for attention from education policymakers and administrators. Efforts to address this gap could involve strategies aimed at attracting and retaining teachers, in secondary public schools fostering diversity and potentially enhancing the educational setting through a mix of perspectives and teaching approaches.

Table 3. The level of Perceived Effects of Continuing Professional Development of the Secondary Public-School Teachers

Indicators	Mean	SD	Min.	Max.	Descriptive
Career Development	3.51	0.373	3.00	4.00	High
Improvement of Financial Income	3.50	0.334	2.83	4.00	High
Development of Networks	3.51	0.322	2.83	4.00	High
Enhancement of Personal Competencies	3.70	0.297	3.00	4.00	High
Overall	3.55	0.245	3.08	4.00	High

The data in the table 3 shows the perceived impact of Continuing Professional Development (CPD) on public school teachers focusing on important factors. The average score for CPD effects is 3.55 with a deviation of 0.245 indicating that teachers believe in its benefits. Specifically, Career Development has a score of 3.51 and a standard deviation of 0.373 showing that CPD positively influences teachers career opportunities within a range

from 3.00 to 4.00. Similarly, Improvement of Financial Income has an average of 3.50 and a standard deviation of 0.334 indicating perceived benefits across a range from 2.83 to 4.00 suggesting responses among teachers.

Networking is another area where CPD is viewed as impactful with an average score of 3.51 and a standard deviation of 0.322 spanning from 2.83 to 4.00 as well. Highlighting the role CPD plays in helping educators establish and strengthen professional relationships.

Moreover, Enhancement of Personal Competencies received the score at 3.70 with a relatively low standard deviation of 0.297 suggesting strong agreement among educators that CPD activities significantly enhance their personal skills and abilities within scores ranging from 3.00 to 4.00. The findings show that high school teachers see development opportunities as beneficial in different aspects, especially in improving personal skills advancing their careers boosting income and expanding professional connections. The consistent results imply a shared belief among teachers about the outcomes of development underlining the significance of these programs, for their overall development and success.

Table 4. The Level of Work Performance of the Secondary Public-School Teachers

	Mean	SD	Min.	Max.	Descriptive
Work	4.49	0.236	3.43	4.89	Very High
Performance	4.47	0.230	3.43	4.07	very riigii

The narrow standard deviation of 0.236 points suggests that most teachers in the group perform consistently around the average indicating a level of performance. This stability in performance highlights the reliability and uniformity of the teaching staff, which's essential for an educational environment.

When looking at the maximum scores we see that the lowest recorded score is 3.43 while the highest is 4.89. Even though the minimum score is below average it still indicates performance on a scale. On the hand with a score of 4.89 some teachers are excelling well in their roles.

The term *high* accurately summarizes these findings. The combination of a mean standard deviation and a wide range of scores paints a picture of consistent and effective teaching practices among secondary public-school teachers. This strong performance level is likely to impact student achievements, school environment and overall educational quality, in schools. These results are likely to provide reassurance for stakeholders, such, as policymakers, school leaders and parents as they indicate a dedicated teaching staff focused on providing top notch education.

Table 5. Relationship Between the Level of the Perceived effects of CPD and the Level Work Performance of Secondary Public-School Teachers

IV	DV	R	\mathbb{R}^2	p-value	Decision
Perceived Effects	Work	0.137	0.0188	0.084	Failed to Reject
of CPD	Performance	0.137	0.0100	0.064	H_0

The R^2 value of 0.0188 indicates that only a small 1.88% of the variation, in work performance can be attributed to the perceived effects of CPD. This suggests that CPDs perceived effects may not have an impact on work performance in this scenario. It is likely that other factors play a role in influencing teachers' work performance than their perceptions of CPD.

The p-value obtained from the analysis is 0.084, which exceeds the significance level of 0.05. As a result, we do not have evidence to reject the hypothesis (H_0) stating that there is no notable correlation between the perceived effects of CPD and work performance. This outcome suggests that any observed correlation may be due to chance than a relationship.

These findings indicate that there isn't a correlation between teachers' perceptions of CPD and their work performance in public schools. While continuous professional development is crucial for growth, its perceived impact may not directly lead to enhancements in work performance based on this study's results. Therefore, it could be beneficial for educational stakeholders to explore factors that could better support teacher effectiveness.

Table 6. Significant Difference in the Relationship Between Secondary Public-School Teachers' Perceived Effects of CPD and Work Performance when Grouped According to Age

	Sum of Squares	df	Mean Square	p-value	Remarks
Between Groups	0.184	6	0.031		Nat
Within Groups	8.797	154	0.057	0.780	Not Significant
Total	8.982	160			Significant

The row denoting *Between Groups* shows the variance attributed to variations, among the age groups of teachers. The sum of squares between groups is 0.184 with 6 degrees of freedom resulting in a value of 0.031. This means square figures indicate the variability among the age groups. The p-value linked to this variation is 0.780 indicating that the disparities in how CPD impacts work performance across age groups of teachers are not statistically significant as the p value exceeds the threshold of 0.05. Essentially any distinctions observed in how CPD influences work performance are likely due to chance than genuine differences between age groups.

On the other hand, the *Within Groups* row illustrates the variance within each age group of teachers showing how much individuals within the group differ from one another. The sum of squares within groups is 8.797 with 154 degrees of freedom yielding a value of 0.057. This within group variation represents the error or unexplained variability by grouping variables.

Furthermore, the *Total* row consolidates all variations in data by combining both between group and within group variations resulting in a sum of squares amounting to 8.982 across 160 degrees of freedom. The findings show that the age of teachers doesn't have an impact on how they view the effects of CPD on their work performance. This is supported by the p value (0.780) indicating that there is no difference between age groups in terms of their perceptions of CPD effects. Therefore, it can be inferred that public school teachers of age perceive CPDs impact on their work similarly.

These results hold importance for policymakers and educational leaders as they imply that CPD programs are perceived consistently across age groups of teachers. As a result, there may not be a need to customize CPD initiatives based on age demographics potentially simplifying the development and execution of these development programs. While age doesn't appear to be a factor, other variables could still influence how effective CPD is perceived to be and warrant investigation, in future research studies.

Table 7. Significant Difference in the Relationship Between Secondary Public-School Teachers' Perceived Effects of CPD and Work Performance when Grouped According to Sex

Sex	Mean	SD	p-value	Remarks
Male	4.40	0.270	0.020	Cignificant
Female	4.50	0.210	0.020	Significant

Male teachers on average believe that professional development has an effect, on their work performance scoring it at 4.40 with a deviation of 0.270. In contrast female teachers rate the impact higher at 4.50 with a standard deviation of 0.210. The p-value for this comparison stands at 0.020 indicating a difference in perception between male and female teachers at the 0.05 level.

The p-value of 0.020 signifies that there is less than a 2% chance that the observed disparity in ratings random chance. Hence, we can conclude that there exists a distinction in how male and female educators view the effects of development on their job performance. Specifically female teachers tend to view development as having a positive influence on their work compared to their male counterparts. These results suggest that CPD initiatives might be more effective or better received by educators or that they derive benefits from such programs compared to male teachers due to factors, like learning preferences professional growth requirements or workplace dynamics influencing how CPD is perceived and utilized in practice.

Moreover, the findings emphasize the significance of taking into account gender variations when creating and executing development programs for educators. Customizing these initiatives to cater to the requirements and viewpoints of female teachers could boost their impact leading to better teacher effectiveness and student achievements, in high schools. The notable contrast in perspectives emphasizes the need, for investigation to grasp the root causes and formulate approaches that can close this divide guaranteeing that all educators reap benefits from professional growth opportunities.

4. DISCUSSION

Demographic Profile of the Secondary Public-School Teachers in Terms of Age.

The demographic breakdown of public-school teachers provides insights into the age distribution within the teaching community shedding light on trends and potential impacts on the education sector

Following closely behind the 31-35 age group is the 25-30 bracket. Together these two cohorts represent a noticeable trend toward youthfulness among educators. This trend is reinforced by efforts to attract individuals to teaching through enhanced salary structures, professional growth opportunities and favorable working environments. For instance, the recruitment strategies and financial assistance, for aspiring teachers in the United Kingdom have proven effective in revitalizing the teaching sector as noted by OECD in 2019. Additionally midcareer educators between the ages of 36 to 45 constitute a part of the teaching workforce. This demographic plays a role in mentoring teachers and ensuring stability and continuity within educational institutions. Studies indicate that mid-career teachers leverage their experience and honed teaching abilities to uphold quality and support the development of less seasoned colleagues.

Furthermore, teachers aged 46-55 represent portions of the workforce with individuals aged 46-50. The group of educators over the age of 55 constitutes 5.0% of the workforce. This distribution trend highlights a scenario where older educators are gradually retiring underscoring the need to recruit educators to address this gap. The aging educator population at secondary education levels presents challenges such as rising retirement rates emphasizing the importance of recruitment and retention policies to ensure a supply of qualified educators (OECD, 2019; NCES,2021). Having a mix of seasoned teachers in schools is advantageous as it promotes mentorship and growth opportunities. Nevertheless, the increasing age of educators and the necessity for hiring underscore the significance of implementing policies that encourage both retaining teachers and attracting fresh faces to the field.

Demographic Profile of the Secondary Public-School Teachers in Terms of Sex

The makeup of public-school teachers, in terms of sex shows an imbalance reflecting wider trends seen in the field of education. The data reveals that women are the majority in this profession with 111 female teachers making up 68.9% of the teaching staff. This gender gap is not unique to schools but mirrors a global pattern where women make up the majority of teachers. A report from the Organization for Economic Cooperation and Development (OECD) in 2019 states that 70% of teachers in secondary education across member countries are women. This trend is often linked to cultural and social factors that have associated teaching as a profession dominated by women.

Moreover, having a group of teachers can offer a range of perspectives and teaching approaches enhancing the educational journey, for all students (Dee, 2007). The data in the percentage column further emphasizes the gender gap as male teachers reach 100% after accounting for the higher number of female teachers. This evident imbalance raises concerns for policymakers and administrators. To bridge this gap efforts could be made to attract and retain teachers in secondary public schools.

By applying approaches to attract and keep teachers, those, in charge of education can aim for a gender balance, among educators. These initiatives can lead to an enhanced learning atmosphere ultimately bringing advantages to both students and teachers.

Perceived Effects of Continuing Professional Development of the Secondary Public-School Teachers

The study's results regarding the perceived impacts of Continuing Professional Development (CPD) on public school teachers shed light on how it enhances aspects of teachers' professional lives. The findings, outlined in Table 3 reveal a belief in the benefits of CPD with a score of 3.55 and a standard deviation of 0.245. This indicates a shared view among teachers about the effects of CPD on their careers.

One significant area where CPD plays a role is in career development. Teachers see CPD as improving their career prospects. Existing literature supports these conclusions by stressing the importance of CPD programs for growth and advancement in one's career path. For instance, Kennedy (2019) highlights that effective CPD can result in teaching methods increased job satisfaction and better opportunities for career progression among educators.

Regarding the Enhancement of Financial Income, teachers' overall positive view is crucial as financial rewards often play a role, in boosting motivation and retention in the teaching field. Recent research by Sims and colleagues (2021) supports this idea highlighting that CPD opportunities linked to salary increases can improve teachers' financial security and job satisfaction.

The study also emphasizes the significance of CPD in building networks. This underscores how CPD helps cultivate relationships and networks vital for learning and support among educators. As noted by Avalos (2019) these networks formed through CPD facilitate the exchange of practices, mutual assistance and continuous professional development.

Furthermore, the aspect of enhancing competencies indicates strong agreement among teachers on the positive influence of CPD on their skills and abilities.

The research supports the idea that engaging in development activities can greatly enhance teachers teaching skills, knowledge, in their area and overall effectiveness in the classroom. According to Desimone and Garet (2019) quality professional development is closely tied to enhancements in teaching methods and student academic performance.

The study shows that teachers at schools view professional development as highly beneficial across various aspects especially in developing personal skills advancing their careers increasing income and building professional relationships. These findings are consistent with existing literature that consistently underscores the role of professional development, in aiding teachers progress and job satisfaction.

Work Performance of the Secondary Public-School Teachers

The data provided gives an evaluation of the work performance of public-school teachers. With a score of 4.49, on the performance scale it indicates that most teachers are performing well surpassing satisfactory levels. This high average reflects positively on the quality of education being delivered and's in line with studies showing a connection between teacher performance and student outcomes (Sims, S. et al., 2021).

Relationship Between the Level of the Perceived effects of CPD and the Level Work Performance of Secondary Public-School Teachers.

The objective of this study, on how Continuing Professional Development (CPD) correlates the work performance of public-school teachers reveals a positive relationship. This suggests that higher perceived CPD effects are somewhat related to work performance though the link is weak. These results imply that CPD effects do not significantly impact work performance, underscoring the importance of considering factors on teachers' effectiveness.

Kennedy (2019) suggests that the effectiveness of development programs can vary depending on various factors such as the context, implementation and teachers' specific needs. While professional development is crucial for growth its benefits may not always translate into improvements in performance.

By incorporating Yeaxlees Theory of Lifelong Learning it highlights the significance of considering development as a part of an ongoing educational journey. This perspective encourages a shift in focus from expecting performance improvements to fostering a culture that values learning and growth. Embracing this approach can help ensure that initiatives aimed at growth like CPD are aligned with the overarching objective of learning ultimately leading to sustained and meaningful enhancements, in teacher performance over time.

Difference in the Perceived Effects of CPD and Work Performance when Grouped According to Age.

The results, from the table displaying the analysis of variance (ANOVA) show that there are no differences in how Continuing Professional Development (CPD) impacts the work performance of public-school teachers based on age. This indicates that regardless of their age secondary public-school teachers hold views on how CPD influences their work performance.

This outcome is consistent with studies showing that CPD programs generally have an effect on teachers' performance regardless of age. For example, Hoisington and Winokurs (2018) research highlighted elements in CPD programs such as focus on content, active learning and collaboration which prove beneficial across all age groups. The shared perceptions found in this study may stem from these features being universally applicable.

Difference in the Perceived Effects of CPD and Work Performance when Grouped According to Sex

The study results show that there is a difference, in how male and female secondary public-school teachers perceive the impact of Continuing Professional Development (CPD) on their work performance. Female teachers on average believe that CPD has an effect on their work performance compared to male teachers. Recent research also highlights the importance of considering gender differences in the effectiveness of development programs.

Various studies have delved into how CPD affects female teachers highlighting unique learning preferences professional development requirements and workplace dynamics as potential explanations for these disparities. For example, Papay et al. (2020) discovered that collaborative and reflective CPD activities are more beneficial, for female teachers while male teachers may prefer technical skill focused training.

5. CONCLUSION

The makeup of public-school teachers' demographics shows that there is a presence of younger educators, especially those, in the age groups of 31-35 and 25-30 making up a total of 44.1% of the workforce.

Furthermore, there is a gender gap among public school teachers with female educators outnumbering male counterparts. Addressing this imbalance requires targeted approaches to attract and retain teachers.

On the other hand, the value placed on Continuing Professional Development (CPD) by public school teachers is evident as it significantly contributes to their career advancement, financial well-being, professional relationships and personal skills.

The study also uncovers a link between how Continuing Professional Development (CPD) is perceived and the work performance of secondary school teachers suggesting that while CPD is vital for professional development its perceived benefits may not always translate into concrete improvements in performance.

Moreover, analysis using ANOVA reveals no discrepancies in how secondary school teachers perceive the impact of CPD, on work performance when categorized by age groups indicating that designed CPD programs featuring content, interactive learning and teamwork bring benefits to people of all ages.

Additionally, a notable difference in how male and female secondary public-school teachers perceive the impact of Continuing Professional Development (CPD) on their work performance has been uncovered in the research with women teachers noting an influence.

RECOMMENDATIONS

The following recommendations where crafted, based on the results and analysis made in this study.

To address the lower number of teachers aged 46 and above, which raises concerns about an aging workforce, school administrators need to create and put in place strategies, for recruiting and keeping staff to tackle the issues brought about by an aging workforce.

To address the gender gap among public-school teachers, school administrators should introduce tailored approaches to draw in and keep male educators.

To enhance the level of the perception of teachers towards the effect of CPD, into a very high and more reliably scores, the Department of Education should ought to make sure that professional development programs are well crafted and beneficial, to everyone integrating features like content emphasis, interactive learning and teamwork. By creating CPD activities that're interesting and useful for teachers of age groups the department can enhance its influence on teacher effectiveness and student educational achievements.

To maintain an efficient group of educators the Department of Education ought to create and enforce measures that promote the development and overall welfare of teachers. This involves ensuring resources, in classrooms cultivating a workplace atmosphere and providing competitive pay and benefits.

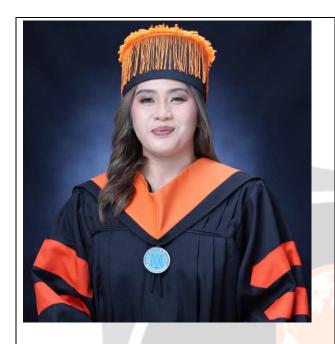
To further understand the impact of professional development towards teacher effectiveness, future studies should also look other variables like, teaching background, subject specialty and the quality of school leadership. How professional development programs are perceived.

REFERENCES

- [1]. Avalos, B. (2019). Teacher professional development in Teaching and Teacher Education over ten years. Teaching and Teacher Education, 27(1), 10-20. https://doi.org/10.1016/j.tate.2010.08.007
- [2]. Creswell, J. W. (2012). Educational research: Planning, conducting, and evaluating quantitative and qualitative research (4th ed.). Boston, MA: Pearson.
- [3]. Dee, T. S. (2007). Teachers and the Gender Gaps in Student Achievement. Journal of Human Resources, 42(3), 528-554. doi: https://doi.org/10.3368/jhr.XLII.3.555
- [4] .Desimone, L. M., & Garet, M. S. (2019). Best practices in teachers' professional development in the United States. Psychology, Society & Education, 5(1), 252-263. https://doi.org/10.25115/psye.v5i1.1020

- [5]. Hoisington, C., & Winokur, J. (2018). Teaching Teachers: Science Professional Development for the 21st Century. Science and Children, 55(6), 73-79.
- [6]. Kanya, N., Fathoni, A., & Ramdani, Z. (2021). Factors affecting teacher performance. International Journal of Evaluation and Research in Education, 10 (4). DOI: 10.11591/ijere.v10i4.21693
- [7]. Kennedy, M. M. (2019). How does professional development improve teaching? Review of Educational Research, 86(4), 945-980. https://doi.org/10.3102/0034654315626800
- [8].Organisation for Economic Co-operation and Development (OECD). (2019). Education at a Glance 2019: OECD Indicators. Retrieved from https://www.oecd-ilibrary.org
- [9]. Pama, P. (2023). Affecting Teachers' Performance and Effectiveness in Public Secondary Schools in Agusan Del Sur, Division, Philippines: Determinant Factors Inquiry. DOI: 10.5281/zenodo.7607549
- [10]. Papay, J. P., Taylor, E. S., Tyler, J. H., & Laski, M. E. (2020). Learning Job Skills from Colleagues at Work: Evidence from a Field Experiment Using Teacher
- [11]. Rosser, A. and Fahmi, M. (2019). The political economy of teacher management reform in Indonesia. International Journal of Educational Development, vol. 61, pp. 72-81, 2019, doi: 10.1016/j.ijedudev.2017.12.005.
- [12]. Sarabia, A. and Collantes, L. (2020). Work-Related Stress and Teaching Performance of Teachers in Selected School in the Philippines. Indonesian Research Journal in Education, 4 (1). https://online-journal.unja.ac.id/index.php/irje/index%7C
- [13].Sims, S., & Fletcher-Wood, H. (2021). *Identifying the characteristics of effective teacher professional development: a critical review. School effectiveness and school improvement, 32(1), 47-63.*
- [15]. Tribunalo, R.and Ortizo, G. (2023). Continuing Professional Development Model in the Schools Division of Sarangani. East Asian Journal of Multidisciplinary Research, 2 (4). https://doi.org/10.55927/eajmr.v2i4.3744
- [16]. Williams, et al. (2022). Beginning Quantitative Research. SAGE Publications, Limited.

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