Classrooms in Diversified Academic Context: Analysis on Students' Learning Styles and Teachers' Teaching Style in Philippine High Schools

Myla Polines Millondaga

Department of General Teacher Training, North Eastern Mindanao State University,

Tandag City, Surigao del Sur 8300, Philippines

mpmillondaga@nemsu.edu.ph

HOW TO CITE:

Myla Polines Millondaga (2026). Classrooms in Diversified Academic Context: Analysis on Students' Learning Styles and Teachers' Teaching Style in Philippine High Schools. International Journal of Special Education, 41(13s), 447-459

COPYRIGHT STATEMENT:

Copyright: © 2026 Authors. Open access publication underthe terms and conditions of the Creative CommonsAttribution (CC BY)

ABSTRACT:

Students' learning preferences have shifted the focus of Philippine schools from traditional, teacher-centered instruction toward more learner-centered and responsive educational practices. As classrooms become increasingly diverse in terms of students' abilities, experiences, and learning preferences, educators are expected to adopt flexible instructional strategies that accommodate these differences. This study explored the students' preferred learning styles and teachers' teaching styles in Surigao del Sur, Philippines. There were a total of 319 students and 77 teachers from the region who participated in this study. Their learning and teaching styles were identified based on the Grasha Teaching Style Inventory (GTSI) and the Grasha–Riechmann Student Learning Style Scales (GRSLSS). The findings revealed that students predominantly preferred the collaborative learning style, followed by dependent and independent learning styles, while teachers primarily adopted the facilitator teaching style. Students' learning styles were not significantly influenced by sex or school type, whereas educational background was the only demographic factor that significantly affected teachers' teaching styles. Nevertheless, there was a notable alignment between students' collaborative learning preferences and teachers' facilitative instructional approaches. Learner-centered approaches, particularly those emphasizing facilitation, collaboration, and active participation, are well matched with students' preferred learning styles and may therefore promote greater classroom engagement, critical thinking, and meaningful knowledge construction. The persistence of teacher-directed clusters indicates that structured instruction remains valuable, particularly for students who benefit from explicit guidance, clear expectations, and systematic content delivery. The results emphasized the importance of maintaining flexible, learner-centered teaching strategies that accommodate diverse learning preferences and enhance classroom engagement..

license (http://creativecommons.org/licenses/by/4.0/).

Keywords: classroom instruction, high school education, learning style, student-centered learning, teaching style

Introduction

Philippine high schools are facing the challenge of responding to the diverse learning needs, preferences, and abilities of students in increasingly heterogeneous classrooms. Filipino teachers recognize the need to implement instructional approaches that are flexible, learner-centered, and responsive to these individual differences to enhance student engagement, participation, and academic achievement (Abdurahim-Salain et al., 2026; Bantillo et al., 2024; Chavez et al., 2026).

As classrooms become more diverse, relying on a single teaching approach may no longer be sufficient to address the varying ways students acquire, process, and apply knowledge. Hence, this study explored the learning styles of Filipino high school students and the teaching styles of their teachers to provide empirical evidence on the extent to which instructional practices correspond with students' preferred ways of learning. Specifically, the study sought to identify the dominant teaching and learning styles, examine the influence of selected demographic characteristics on these educational constructs, and determine patterns of alignment between teachers' instructional approaches and students' learning preferences.

International evidence has consistently demonstrated the importance of aligning instructional practices with students' learning preferences to enhance educational outcomes. For example, Bibi and Bagum (2025) reported that the implementation of differentiated and learner-centered instructional approaches in secondary level significantly could improve students' academic performance and classroom engagement. Likewise, Asrifan et al. (2025) found that discrepancies between teaching styles and students' learning preferences were associated with lower levels of student satisfaction and academic achievement, underscoring the importance of instructional alignment.

During early childhood, differences in cognitive styles become evident through children's preferred ways of exploring and processing information, including visual observation, active manipulation of objects, verbal communication, and reflective thinking. When instructional practices overlook these individual differences, some learners may benefit more than others because classroom activities tend to favor particular ways of learning (Fajarwati et al., 2026). Although learning preferences are conceptually distinct from cognitive styles, the two constructs are closely related, as both influences how children engage with instructional activities, interpret learning experiences, respond to teacher guidance, and interact with educational resources. Understanding cognitive styles and learning preferences enables teachers to design more inclusive, responsive, and learner-centered environments that accommodate individual differences and support children's cognitive and academic development from an early age (Wanmei, 2025).

In the Philippine context, Balonda and Dollente (2025) reported that many Filipino secondary school students exhibit bimodal and trimodal learning preferences, particularly combinations of aural, read/write, and kinesthetic modalities. Despite this diversity, teachers predominantly relied on visual instructional approaches, revealing a mismatch between students' preferred ways of learning and the teaching strategies commonly implemented in the classroom.

Given the need to understand the diversity of classroom settings in the Philippines, this study explored the students' learning styles and teachers' teaching styles. While previous studies have primarily investigated teaching styles or learning styles as separate educational constructs, the present study explored both dimensions to provide context on how instruction should correspond with students' preferred ways of learning. The study advances current knowledge on instructional alignment and provides a

practical basis for designing learner-centered educational interventions that are responsive to the characteristics of Filipino teachers and learners.

Literature Review

Learning style refers to an individual's relatively stable pattern of perceiving, processing, and responding to information during the learning process, reflecting the unique ways in which learners acquire and understand new knowledge (Delina et al., 2025). Because students differ in their preferred approaches to learning, they employ distinct strategies for receiving, organizing, interpreting, and retaining information. Aligning instructional practices with these preferences has been shown to enhance knowledge retention by facilitating the transfer of information into long-term memory (Wiangga, 2024).

Appropriate learning styles have been associated with improved academic performance, as they promote comprehension, more effective learning processes, and increase engagement with instructional content (Shala et al., 2024). Previous research has demonstrated that learning outcomes are enhanced when instructional strategies are aligned with students' learning preferences, particularly through the integration of visual instructional materials, collaborative discussions, and other learner-centered pedagogical approaches (Du Plooy et al., 2024).

However, empirical evidence on students' learning styles and teachers' teaching style matching remains limited within the Philippine educational context, particularly in secondary schools. Learning styles, such as visual, auditory, and collaborative, helped students in having strong digital competence for the Filipino subject (Erie, 2025). Similarly, students from Mountain Province, Philippines prefer visual learning, followed by auditory and tactile modalities (Casido, 2026). In Misamis Oriental, the primary learning style of students was auditory for reading, but this did not significantly influence their reading performance (Paypa et al., 2024).

In Casido (2026), teachers recognized the importance of strong alignment between students' learning preferences and teachers' instructional strategies. For example, teachers with audio-visual students frequently use visual instructional materials, verbal explanations, discussions, and other multimodal teaching strategies. Although teachers also incorporated demonstrations and hands-on activities, these were implemented less frequently because of classroom constraints such as limited time and instructional resources.

Researchers believed that learners differ in how they perceive, process, and apply knowledge (Ampong, 2026; Montecalvo, 2026; Putri, 2025; Ramadani & Inayati, 2024). Studies emphasize that meaningful learning occurs when instructional strategies are adapted to learners' varying strengths, experiences, and preferences. Specifically, the Grasha–Riechmann model offers a particularly relevant framework for understanding the interaction between teaching and learning within the classroom. In this model, teaching styles and learning styles as interrelated constructs, identifying five instructional approaches (Expert, Formal Authority, Personal Model, Facilitator, and Delegator) and six corresponding learning styles (Independent, Dependent, Collaborative, Participant, Avoidant, and Competitive) (Ramirez et al., 2025; Sim et al., 2022). This suggests that educational effectiveness is strengthened when teachers adapt their instructional approaches to complement students' preferred ways of learning.

Although international studies have extensively examined the alignment between instructional approaches and learning preferences, relatively few local investigations have explored how Filipino teachers' teaching styles correspond with students' preferred ways of learning or how demographic characteristics influence these educational constructs. This gap restricts the development of evidence-based instructional strategies that are responsive to the needs and preferences of Filipino learners.

Expanding research in learning and teaching style is therefore essential to provide context-specific

evidence that can guide curriculum implementation, classroom instruction, teacher professional development, and educational policy aimed at improving teaching effectiveness and student learning outcomes.

Research Questions

This study explored how demographic profile of students and teachers from Surigao del Sur influenced their learning style and teaching style. Below are the specific research questions asked in this study.

1. What are the preferred learning styles of the students?
2. What is the distribution of teaching styles of teachers?
3. Does students' demographic profile influence their learning style?
4. Does teachers' demographic profile influence their teaching style?
5. How are learning styles and teaching styles clustered?

Methodology

Research Design

This study explored the factors that influence the teaching styles employed by teachers and the learning styles of high school students. A quantitative, cross-sectional, non-experimental correlational-predictive research design was adapted to make the analysis. This helped in describing teaching and learning styles, examine their relationship, and determine whether selected demographic variables significantly predicted variations in these educational constructs without manipulating the study variables (Gómez-Tabares et al., 2022; Wahyuni et al., 2025). This may provide empirical evidence that may help Filipino teachers align instructional practices with students' learning preferences, which may promote effective teaching and improve learning outcomes.

Participants of the Study

The participants of this study came from Carrascal, Cantilan, Madrid, Carmen, and Lanuza (CarCanMadCarLan) in Surigao del Sur. Participants in this study were randomly selected through online sampling. There were 319 students and 77 teachers from Surigao del Sur, Philippines who participated in this study. The use of online sampling facilitated efficient data collection by enabling researchers to reach participants across geographically dispersed schools while minimizing time, travel, and administrative costs (Mariya et al., 20203). It also provided respondents with the flexibility to complete the survey at their convenience using internet-enabled devices.

Instrumentation

Data was collected using two structured and validated questionnaires developed for this study. The Teaching Style Questionnaire was administered to teachers and consisted of 40 items adapted from the Grasha Teaching Style Inventory (GTSI). It measured five dimensions of teaching style: Expert, Formal Authority, Personal Model, Facilitator, and Delegator. Each dimension assessed teachers' preferred instructional approaches and classroom management practices. The Learning Style Questionnaire was administered to students and comprised 60 items adapted from the Grasha–Riechmann Student Learning Style Scales (GRSLSS). The instrument assessed six learning style dimensions: Independent, Dependent, Collaborative, Participative, Avoidant, and Competitive.

Both questionnaires utilized a 5-point Likert scale, with responses ranging from 1 (Strongly Disagree) to 5 (Strongly Agree), allowing respondents to indicate the extent to which each statement described their teaching or learning preferences.

Prior to the actual data collection, the instruments underwent content validation by experts to establish their relevance, clarity, and appropriateness for the study. A pilot test was subsequently conducted among respondents with characteristics similar to those of the target population to determine the instruments' reliability and identify any ambiguous items. Necessary revisions were incorporated based on the validation and pilot-testing results to enhance the instruments' validity and reliability.

Data Collection

Data collection was carried out in coordination with the school administrators of the participating schools. Ethical standards were strictly observed by obtaining the necessary institutional approvals, securing informed consent from all participants (and parental consent where applicable), ensuring voluntary participation, guaranteeing anonymity and confidentiality of responses, and informing participants of their right to withdraw from the study at any stage.

Data Analysis

After data collection, all completed questionnaires were checked for completeness, coded, and encoded into the statistical software for analysis. Responses to the 5-point Likert scale were scored and aggregated according to the respective dimensions of the GTSI and the GRSLSS. For each respondent, the teaching or learning style with the highest composite score was identified as the dominant teaching or learning style and served as the categorical outcome variable in the subsequent analyses.

Descriptive statistics, specifically frequency counts and percentages, were employed to summarize the demographic characteristics of the respondents and to describe the distribution of teaching and learning styles.

To determine whether the demographic profile significantly influenced their teaching and learning styles, multinomial logistic regression was performed using Likelihood Ratio Tests. Multinomial logistic regression was the appropriate statistical technique for identifying significant predictors because both teaching style and learning style consisted of multiple nominal categories. Statistical tests were evaluated at the 0.05 level of significance, with probability values less than 0.05 considered statistically significant.

Results

RQ1: What are the preferred learning styles of the students?

Table 1 presents the contingency table of preferred learning styles based on students' sex (male, female). Out of the 319 student respondents, 137 (42.95%) were male and 182 (57.05%) were female.

The Collaborative learning style emerged as the most prevalent, accounting for 36.50% of male respondents and 42.31% of female respondents, representing a total of 127 students (39.81%). This finding indicates that most students preferred learning environments characterized by peer interaction, cooperation, and the exchange of ideas, suggesting a strong inclination toward collaborative learning experiences.

The Dependent learning style ranked second in prevalence, comprising 24.82% of male respondents and 23.08% of female respondents, or 76 students (23.82%) overall. This was followed by the Independent learning style, which accounted for 16.61% of the total sample.

Generally, the distribution of preferred learning styles was similar between male and female students.

Table 1. Preferred learning styles based on students' sex.

Learning Styles	Male		Female		Total	
	n	%	n	%	n	%
Independent	24	17.52%	29	15.93%	53	16.61%
Avoidant	9	6.57%	10	5.49%	19	5.96%
Collaborative	50	36.50%	77	42.31%	127	39.81%
Dependent	34	24.82%	42	23.08%	76	23.82%
Competitive	5	3.65%	9	4.95%	14	4.39%
Participant	15	10.95%	15	8.24%	30	9.40%
Total	**137**	**100.00%**	**182**	**100.00%**	**319**	**100.00%**

Table 2 indicates that the Collaborative learning style was the most prevalent among public school students (39.62%), followed by the Dependent (23.90%) and Independent (16.67%) learning styles. In contrast, the Participant, Avoidant, and Competitive learning styles were the least preferred. These findings suggest that students generally favor learning environments characterized by cooperation, interaction, and shared responsibility, while relatively fewer students prefer highly competitive or disengaged approaches to learning.

Table 2. Preferred learning styles based on students' school type.

Learning Styles	Public		Private		Total	
	n	%	n	%	n	%
Independent	53	16.67%	0	0%	53	16.61%
Avoidant	19	5.97%	0	0%	19	5.96%
Collaborative	126	39.62%	1	100%	127	39.81%
Dependent	76	23.90%	0	0%	76	23.82%
Competitive	14	4.40%	0	0%	14	4.39%
Participant	30	9.43%	0	0%	30	9.40%
Total	**318**	**100.00%**	**1**	**100%**	**319**	**100.00%**

RQ2: What is the distribution of teaching styles of teachers?

Table 3 presents the distribution of teaching styles according to the sex of the teachers. The Facilitator teaching style was the most prevalent among both male (47.06%) and female (36.67%) teachers, suggesting that teachers preferred learner-centered instructional approaches that promote active participation, collaboration, and independent knowledge construction.

The Expert teaching style ranked second and was more frequently observed among female teachers (35.00%) than male teachers (17.65%), indicating a greater tendency among female respondents to emphasize subject matter expertise and the transmission of knowledge. In contrast, male teachers exhibited a higher proportion of the Facilitator style, suggesting a relatively stronger inclination toward encouraging student autonomy and engagement in the learning process.

Meanwhile, the Formal Authority and Personal Model teaching styles were the least represented among both groups.

Table 3. Teaching styles based on teachers' sex

Teaching Styles	Male		Female		Total	
	n	%	n	%	n	%
Expert	3	17.65%	21	35.00%	24	31.17%
Formal Authority	1	5.88%	6	10.00%	7	9.09%
Personal Model	5	29.41%	11	18.33%	16	20.78%
Facilitator	8	47.06%	22	36.67%	30	38.96%
Total	**17**	**100.00%**	**60**	**100.00%**	**77**	**100.00%**

Table 4 presents the distribution of teaching styles according to teachers' highest educational attainment. Teachers holding a bachelor's degree predominantly exhibited the Facilitator teaching style (40.63%), indicating a preference for learner-centered instruction, whereas master's degree holders most frequently demonstrated the Expert teaching style (50.00%), reflecting a greater emphasis on subject matter expertise and knowledge transmission. The Personal Model teaching style was observed among both bachelor's and master's degree holders but was less prevalent than the Facilitator and Expert styles.

Table 4. Teaching styles based on teachers' educational attainment

Teaching Styles	Bachelor		Masters		Doctor		Total	
	n	%	n	%	n	%	n	%
Expert	18	28.13%	6	50.00%	0	0.00%	24	31.17%
Formal Authority	6	9.38%	0	0.00%	1	100.00%	7	9.09%
Personal Model	14	21.88%	2	16.67%	0	0.00%	16	20.78%
Facilitator	26	40.63%	4	33.33%	0	0.00%	30	38.96%
Total	**64**	**100.00%**	**12**	**100.00%**	**1**	**100.00%**	**77**	**100.00%**

Table 5 presents the distribution of teaching styles according to teachers' length of service. Teachers with less than one year of teaching experience exclusively exhibited the Expert teaching style (100%), suggesting that novice teachers tend to rely primarily on subject matter knowledge during the initial stages of their professional practice.

Among teachers with 1–10 years of service, the Facilitator teaching style was the most prevalent (47.62%), reflecting a preference for learner-centered instructional approaches that promote active student participation and engagement. Similarly, teachers with 11–20 years of teaching experience predominantly demonstrated the Facilitator style (36.36%), although a substantial proportion adopted the Personal Model style (31.82%), indicating a greater tendency to integrate personal experiences and demonstrations into classroom instruction.

In contrast, teachers with 31 years or more of teaching experience most frequently exhibited the Expert teaching style (57.14%), suggesting emphasis on subject matter expertise and knowledge transmission among the most experienced educators.

Table 5. Teaching styles based on teachers' length of service

Teaching Styles	<1 year		1 – 10 years		11 – 20 years		21 – 30 years		>31 years		Total	
	n	%	n	%	n	%	n	%	n	%	n	%
Expert	2	100%	11	26.19%	5	22.73%	2	50.00%	4	57.14%	24	31.17%
Formal Authority	0	0%	3	7.14%	2	9.09%	0	0.00%	2	28.57%	7	9.09%
Personal Model	0	0%	8	19.05%	7	31.82%	1	25.00%	0	0.00%	16	20.78%
Facilitator	0	0%	20	47.62%	8	36.36%	1	25.00%	1	14.29%	30	38.96%
Total	**2**	**100%**	**42**	**100%**	**22**	**100%**	**4**	**100%**	**7**	**100%**	**77**	**100%**

RQ3: Does students' demographic profile influence their learning style?

Table 6 presents the likelihood ratio tests examining the effects of sex and school type on

students' learning styles. The results indicate that sex did not have a statistically significant effect on learning styles ($\chi^2 = 1.824$, $p = 0.873$). Similarly, school type was not a significant predictor of students' learning styles ($\chi^2 = 1.728$, $p = 0.885$). These findings suggest that students' learning style preferences were comparable across sexes and school types, indicating that neither demographic characteristic significantly influenced the likelihood of exhibiting a particular learning style.

Table 6. Influence of students' demographic profile to their preferred learning style

Effect	-2 Log Likelihood	χ^2	Sig.
Intercept	44.169	0.000	-
Sex	45.993	1.824	0.873
School Type	45.897	1.728	0.885

RQ4: Does teachers' demographic profile influence their teaching style?

Table 7 presents the likelihood ratio tests examining the influence of teachers' demographic characteristics on their teaching styles. Sex did not significantly influence teaching style ($\chi^2 = 5.022$, $p = 0.170$), indicating that male and female teachers exhibited comparable teaching style preferences. Similarly, years in teaching was not a statistically significant predictor of teaching style ($\chi^2 = 17.467$, $p = 0.133$), suggesting that teaching experience was not associated with variations in teachers' instructional approaches.

In contrast, educational background significantly influenced teaching style ($\chi^2 = 13.355$, $p = 0.038$). This finding indicates that teachers' highest educational attainment was significantly associated with their preferred teaching styles, implying that differences in academic preparation may contribute to variations in instructional approaches.

Table 7. Influence of teachers' demographic profile to their teaching style

Effect	-2 Log Likelihood	χ^2	Sig.
Intercept	48.899	0.000	-
Sex	53.921	5.022	0.170
Educational Background	62.254	13.355	0.038
Years in Teaching	66.366	17.467	0.133

RQ5: How are learning styles and teaching styles clustered?

Table 8 presents the clustering of teachers and students based on the dominant combinations of teaching and learning styles.

Cluster 1 represents a teacher-directed instructional profile, characterized by the predominance of the Expert and Formal Authority teaching styles (40.26%) and the Dependent, Participant, and Competitive learning styles (37.61%). This suggests that teachers in this cluster primarily emphasize content expertise, structured instruction, and classroom control, while students tend to rely on teacher guidance, actively participate in classroom activities, and are motivated by academic competition.

Cluster 2 reflects a demonstrative and structured instructional profile, where the Personal Model, Expert, and Formal Authority teaching styles

(61.04%) are paired with the same dominant student learning styles. This combination indicates that, in addition to providing direct instruction, teachers serve as role models by demonstrating skills and expected behaviors, thereby supporting students who prefer guided participation and structured learning experiences.

In contrast, Clusters 3 and 4 represent more learner-centered instructional environments. Cluster 3 exhibited the highest cumulative proportion of teaching styles (90.91%), consisting of the Facilitator, Personal Model, and Expert teaching styles, together with the Collaborative, Participant, and Independent learning styles (65.82%). This cluster suggests a strong alignment between facilitative teaching practices and students' preference for cooperative, participatory, and self-directed learning, indicating an environment that promotes active engagement and shared knowledge construction.

Similarly, Cluster 4 combined the Facilitator and Expert teaching styles (70.13%) with the Independent, Collaborative, and Participant learning styles (65.82%), reflecting a balanced instructional approach in which teachers integrate subject expertise with learner-centered facilitation.

Generally, teaching and learning styles tend to converge into either teacher-centered or learner-centered instructional profiles, emphasizing the importance of aligning instructional strategies with students' learning preferences to foster meaningful classroom engagement and effective learning outcomes.

Table 8. Different clusters of learning styles and teaching styles

Cluster	Dominant Teaching Style(s)	Teaching Style (%)	Dominant Learning Style(s)	Learning Style (%)	Description of the Cluster
1	Expert, Formal Authority	**40.26**	Dependent, Participant, Competitive	**37.61**	**Teacher-directed instructional cluster.** This cluster represents classrooms where teachers primarily emphasize subject expertise and instructional authority, while students exhibit structured, teacher-guided, and achievement-oriented learning preferences.
2	Personal Model, Expert, Formal Authority	**61.04**	Participant, Dependent, Competitive	**37.61**	**Demonstrative and structured learning cluster.** Teachers combine subject expertise with modeling of skills and authoritative instruction, whereas students demonstrate preferences for guided participation, structured learning, and moderate academic competition.
3	Facilitator, Personal Model, Expert	**90.91**	Collaborative, Participant, Independent	**65.82**	**Learner-centered collaborative cluster.** Teachers predominantly employ facilitative and modeling approaches while maintaining content expertise, creating learning environments that encourage collaboration, active participation, and independent learning among students.

4	Facilitator, Expert	**70.13**	Independent, Collaborative, Participant	**65.82**	**Balanced facilitative–expert cluster.** Teachers integrate learner-centered facilitation with strong content knowledge, supporting students who prefer independent learning while also valuing collaboration and active classroom participation.

Discussion

This study explored how different demographic profiles influence students' learning style and teachers' teaching style. Primary findings revealed that students' learning style did not differ based on their sex and type of school. Similarly, teachers' teaching style did not differ based on their sex and years in teaching but did differ based on their educational background.

Learning style involves the cognitive, behavioral, and affective preferences that shape how individuals perceive, process, and engage with information within a learning environment (Delina et al., 2025). Because students differ in the rate and manner in which they understand and assimilate new knowledge, teachers are encouraged to employ flexible and adaptive instructional strategies that accommodate these diverse learning preferences. Learning preferences may differ according to sex, with male learners tending to favor active, experiential, and hands-on learning environments, whereas female learners are more likely to favor reflective, cooperative, and collaborative instructional settings (Gaisey et al., 2024). However, this was not the case among Filipino students as they shared similar learning preferences despite variations in their proportional representation. In the Philippine school context, where students are generally exposed to the same curriculum, teaching strategies, and collaborative classroom activities, similarities in learning preferences may possibly outweigh the sex-based differences reported in other educational settings (Mahilum & Escarlos, 2025; Paris, 2025).

In terms of teachers' teaching styles, educational background was the only demographic variable found to significantly influence instructional preferences. Teachers' level of academic preparation may shape how they design, deliver, and facilitate classroom instruction (Özkır & Eskici, 2023). Advanced educational attainment often exposes teachers to a wider range of pedagogical theories, evidence-based instructional strategies, and professional development experiences, which may influence their preference for particular teaching styles. In contrast, sex and years of teaching experience did not significantly affect teaching styles, indicating that teachers tended to adopt similar instructional approaches regardless of gender or length of service.

The findings of this study presented a notable contribution to understanding learning styles among high school students. The predominance of the collaborative learning style among students suggests that learners benefit most from instructional environments that promote interaction, cooperation, and shared knowledge construction. This preference indicates that students are more likely to engage meaningfully in learning when opportunities are provided for group discussions, peer-assisted activities, collaborative problem-solving, and project-based learning (Bibi & Bagum, 2025). At the same time, the relatively high prevalence of the dependent learning style indicates that many students continue to value teacher guidance, clear directions, and structured learning experiences (Chavez, 2023).

The predominance of the facilitator teaching style among teachers reflects an instructional orientation that aligns well with students' collaborative learning preferences. Teachers who adopt facilitative approaches encourage inquiry, discussion, and learner participation while providing guidance throughout the learning

process (Jaya et al., 2025). Such alignment between teaching and learning preferences may foster student engagement, improve classroom interaction, and create learning environments that support deeper understanding and knowledge retention.

Nevertheless, the presence of teachers who predominantly employ the expert, formal authority, and personal model teaching styles highlights the need for instructional flexibility (Almira et al., 2025). Because students possess diverse learning preferences, relying exclusively on a single teaching style may not adequately address the varying academic and social needs of all learners. Effective instruction therefore requires teachers to integrate multiple pedagogical approaches, combining direct instruction with collaborative, experiential, and inquiry-based learning strategies according to lesson objectives and learner characteristics.

Conclusion

This paper explored the learning styles of students and teaching styles of teachers in Surigao del Sur. Collaborative learning was the most preferred learning style among high school students, followed by dependent and independent learning styles. Students generally favor learning environments that encourage cooperation, peer interaction, and shared knowledge construction while still valuing teacher guidance and structured instruction. Notably, students' learning style preferences did not significantly differ according to sex or school type, suggesting that these demographic characteristics were not associated with variations in learning preferences.

The facilitator teaching style emerged as the most prevalent reflecting a preference for learner-centered instructional approaches that promote active participation and collaboration. In contrast, teachers with master's degrees more frequently demonstrated the expert teaching style, emphasizing subject matter expertise and knowledge transmission. Although variations in teaching style were observed across demographic groups, educational background was the only factor that significantly influenced teachers' teaching styles, whereas sex and years of teaching experience did not exhibit significant effects.

There was alignment between students' collaborative learning preferences and teachers' facilitative instructional approaches, suggesting that current classroom practices generally support interactive and student-centered learning. However, the presence of multiple teaching and learning styles also highlights the importance of instructional flexibility. Teachers should adopt a combination of facilitative, expert, modeling, and authoritative approaches based on learners' needs, lesson objectives, and classroom contexts. Likewise, professional development programs should continue strengthening teachers' pedagogical competencies while encouraging instructional strategies that accommodate the diverse learning preferences of students.

References

Abdurahim-Salain, H., Salain, S. A., Indama, A. C., Paraman, M. H., & Chavez, J. V. (2026). Inclusive Education, Emotional Profiling and Empathy of Learners Towards Understanding Barriers and Promoting Strategic Teaching Adaptation. *International Journal of Special Education*, *41*(3s), 177-195.

Almira, N. F., Almira, Z. F., Vircavani, C., & Agustina, E. (2025). A Systematic Review of Teachers' Teaching Styles and Their Impact on EFL Student Learning Outcomes. *Journal of Applied Linguistics and English Education*, *3*(1), 1-15.

Ampong, T. A. (2026). Deliberate Teaching Strategies in Inclusive Science, Math, and ICT Classrooms: Motivating Diverse Learners to Innovate. *International Journal of Special Education*, *41*(3s), 57-62.

Asrifan, A., de Barros Cardoso, L. M. O., & Vargheese, K. J. (2025). Teacher-Student Style Mismatch: Implications for English Language Learning and Classroom Dynamics. *Journal of English Language Studies*, *10*(2), 173-199.

Balonda, L. J. L., & Dollente, L. A. U. (2025). *The impact of learning styles and teaching styles on second language learning success*. *Indonesian Journal of Education Research,* *6*(3), 321–330. https://doi.org/10.37251/ijoer.v6i3.1485

Bantillo, R. B., & Ngag, J. B. J. U. (2024). CHANGING LANDSCAPE OF FILIPINO EDUCATION: TEACHERS'PERSPECTIVES ON TRADITIONAL VS. MODERNIZED APPROACHES TO TEACHING FILIPINO. *Ignatian International Journal for Multidisciplinary Research*, *2*(6), 2409-2420.

Bibi, A., & Bagum, M. (2025). Students' Learning Styles and their Academic Performance at Secondary Level. *Journal of Social Sciences Research & Policy*, *3*(04), 371-385.

Casido, F. (2026). Learning Style Preferences of Grade 6 Learners and Teachers' Coping Strategies in Managing Diverse Learning Styles in Sagada District, Philippines. Journal of *Education, Learning, and Management, 3(1),* 372-386. https://doi.org/10.69739/jelm.v3i1.1898

Chavez, J. V. (2023). Assessing online academic integrity and humanized teaching in Zamboanga Peninsula Polytechnic State University. *Journal of Multidisciplinary in Social Sciences*, *19*(1), 9-17.

Chavez, J. V., Salveleon, R. G., Eustaquio, M. T. L., Adalia, H. G., Rosaldo, M. P. T., Quinto, J. B., ... & Nazareth, I. M. (2026). Practices and strategies of informal assessments on grammar rules among second language learners. *Int J Eval & Res Educ*, *15*(3), 2379-2389.

Delina, E. J., Apdoludin, A., & Aldino, A. (2025). Analysis of Learning Styles of Academically Achieving Students. *Journal la sociale*, *6*(6), 1717-1724.

Du Plooy, E., Casteleijn, D., & Franzsen, D. (2024). Personalized adaptive learning in higher education: A scoping review of key characteristics and impact on academic performance and engagement. *Heliyon*, *10*(21).

Erie, L. J. D. (2025). Learning Styles and Digital Competence of Senior High School Student in Filipino Subject.

Fajarwati, A., Mendes, C., & Lima, R. (2026). COGNITIVE STYLES AND THEIR INFLUENCE ON LEARNING PREFERENCES IN EARLY CHILDHOOD EDUCATION. *Research Psychologie, Orientation et Conseil*, *3*(1), 54-67.

Gaisey, I. K., Ntroaduro, A., Peasah, B. S. O., Anane, C., Oduro, T., & Attila, F. L. (2024). Gender differences on the effects of learning environments on academic performance among tertiary students. *Education & Youth Research*, *4*(2), 130-139.

Gómez-Tabares, A. S., Marín, J. P. C., Vanegas, A. M., Martínez, D. A. L., & Gallego, E. M. M. (2022). The effect of coping strategies on the risk for suicidal ideation and behavior in adolescents. *Mediterranean Journal of Clinical Psychology*, *10*(2), 2282-1619.

Jaya, A., Hartono, R., Wahyuni, S., & Yulianto, H. J. (2025). The Power of Collaborative Learning: How Peer Interaction Improves Student Learning Outcomes?. *Journal of Education and Applied Teaching (JEAT)*, *1*(1), 1-10.

Mahilum, D. Z. E., & Escarlos, G. S. (2025). Sociocultural Theory in the 21st-Century Philippine Secondary Classroom: A Systematic Review of Collaborative Learning and Student Achievement. *International Journal of Research and Innovation in Social Science (IJRISS)*, *9*(26).

Mariya, C. G., Joseph, A., Marina, A., Jesly, M. K., Veronica, M., & Sabeena, M. T. P. (2023). Study on Satisfaction of Students Regarding Online Classes in a Selected College of Nursing, Mangalore. *Journal of Health and Allied Sciences NU*, *13*(02), 193-198.

Montecalvo, E. B. (2026). Analysis of Psychological Preparedness of Immersive Learning Experience to Math Learners. *International Journal of Special Education*, *41*(3s), 117-143.

Özkır, B., & Eskici, M. (2023). Examination of the Relationship Between Academicians' Life Long Learning Tendencies and Thinking Styles. *Journal of Teacher Education and Lifelong Learning*, *5*(2), 933-954.

Paris, S. (2025). TEACHERS'COLLABORATIVE PRACTICES, INNOVATIVENESS AND CREATIVITY. *INTERNATIONAL MULTIDISCIPLINARY RESEARCH JOURNAL Учредители: International Organization of Educators and Researchers Inc.*, *6*(4).

Paypa, J. A., Miranda, P. M. R., & Emperador, E. A. (2024). Learning style and reading performance of Grade 8 students. *International Journal of Science and Management Studies*, *7*(1), 149-155.

Putri, K. (2025). Implementing a Differentiation Approach in Teaching to Accommodate Diverse Learning Styles Of Primary School Students: A Systematic Literature Review. *Journal for Lesson and Learning Studies*, *8*(1), 119-128.

Ramadani, F., & Inayati, N. L. (2024). Differentiated Learning in Islamic Religious Education: Solutions for the Diversity of Student Learning Styles. *Ta'dib: Jurnal Pendidikan Islam*, *29*(2), 290-302.

Ramirez, A. D., Aparente, A. C., Cervantes, J. D., Toldo, L. G., Buo, M. G., Guma, M. J., ... & Recto, O. S. (2025). Assessing the Learning Style of Senior High School TVL Students Using the Grasha Riechmann Model. *International Journal of Research and Innovation in Social Science (IJRISS)*, *9*(11).

Shala, D. S., Thaçi, E., & Shala, A. (2024). Learning styles and motivation: their role in academic performance. *Journal of Educational and Social Research*, *14*(3).

Sim, S. H., & Mohd Matore, M. E. E. (2022). The relationship of Grasha–Riechmann teaching styles with teaching experience of National-Type Chinese primary schools mathematics teacher. *Frontiers in psychology*, *13*, 1028145.

Wahyuni, A. S., Hani, H., Nurjanah, N., Utami, N. M., & Hakim, L. N. (2025). Gender and Learning Styles: A Correlational Study of Preferences Among English Education Students in Universities. *Journal of Applied Linguistics (ALTICS)*, *7*(1), 24-33.

Wanmei, W. (2025). Assessing the effect of a flipped classroom on students' learning performance. *International Journal of Education and Practice, 13(1),* 361–404. https://doi.org/10.18488/61.v13i1.4062

Wiangga, I. A. (2024). The impact of educators' teaching styles on secondary school learners' motivation in English. *Journal of Educational Management and Strategy*, *3*(2), 136-144.