



The Role of Collaborative Work Culture in Enhancing Teacher Effectiveness in SMK Negeri 1 Pabelan

Dhanang Hermawan¹, Mukhamad Kholil Aswan^{2*}

Sekolah Tinggi Ilmu Ekonomi Pariwisata Indonesia

Corresponding Author: Mukhamad Kholil Aswan; Kholilaswan@stiepari.ac.id

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ABSTRACT

This research aims to explore the role of collaborative work culture in enhancing teacher effectiveness in SMK Negeri 1 Pabelan and its subsequent impact on student outcomes. Utilizing a qualitative approach, the study employed in-depth interviews and focus group discussions with teachers and school leaders to understand the dynamics of collaboration within vocational education settings. The findings reveal that a collaborative work culture positively influences teacher effectiveness by fostering continuous professional development, enhancing teaching strategies, and improving student engagement. By integrating interdisciplinary collaboration and co-teaching, teachers were able to provide a more holistic and relevant educational experience, bridging the gap between theoretical knowledge and practical skills. Moreover, collaboration was found to reduce professional isolation, increase job satisfaction, and encourage innovation among teachers. The study highlights the significance of investing in collaborative practices to improve not only teacher performance but also overall educational outcomes, particularly in vocational education, where the goal is to prepare students for the workforce. The originality of this research lies in its focus on vocational education, where the integration of academic theory with practical application is crucial, and where collaboration can significantly impact career readiness. This study provides valuable insights for educators, administrators, and policymakers aiming to enhance teaching quality and student preparedness in vocational settings.

INTRODUCTION

Vocational education serves as a cornerstone in shaping a skilled workforce that can meet the dynamic and evolving demands of industries. SMK Negeri 1 Pabelan are specifically designed to provide students with the technical expertise and hands-on experience needed to excel in various trades and professions, ranging from engineering to hospitality, technology, and the arts (Asnita and Yulastri 2023). The primary goal of VHS is to ensure that students are not only equipped with theoretical knowledge but also possess the practical skills that make them job-ready upon graduation. In this context, the role of teachers in vocational education is paramount, as they bridge the gap between classroom learning and industry practice (Bottiani et al. 2019). Teachers in VHS must possess both subject-matter expertise and an in-depth understanding of current industry standards to effectively transfer knowledge. Their ability to deliver high-quality instruction, foster critical thinking, and mentor students through real-world applications directly influences the quality of education and the employability of graduates. Therefore, the effectiveness of teachers in VHS plays a pivotal role in shaping the quality of vocational education, ensuring that students are not only prepared for the workforce but also capable of contributing to economic growth and development. To achieve these outcomes, the professional development, pedagogical strategies, and support systems available to teachers in vocational settings must be continuously refined and strengthened to meet the ever-changing needs of industries and labor markets.

Teacher effectiveness is widely recognized as a cornerstone in achieving successful educational outcomes, especially in SMK Negeri 1 Pabelan, where the demand for skilled labor in specific industries requires specialized teaching (Bardach and Klassen 2020). Effective teachers do more than impart knowledge – they inspire students, motivate them to engage with the material, and create an environment conducive to learning, where students feel encouraged to explore, ask questions, and apply their skills (Bruno and Strunk 2019). In the context of vocational education, the challenge is even greater due to the need to blend academic theory with hands-on practical application. Teachers must not only deliver content in ways that are academically rigorous but also ensure that students are equipped with real-world skills that can be immediately applied in the workplace. This dual responsibility requires teachers to stay adaptable, innovative, and up-to-date with industry standards, which can be particularly challenging given the rapid pace of technological advancements and changing market demands. Therefore, a strong support system for teachers is essential to maintain their effectiveness. Collaboration among teachers and staff plays a critical role in providing this support, as it allows educators to share strategies, pool resources, and offer mutual assistance in solving instructional challenges (Grissom and Bartanen 2019). Collaboration can foster a sense of community within the school, which is especially important in vocational settings, where teaching methods often rely on interdisciplinary approaches and the integration of both technical and academic learning. By working together, teachers can also engage in ongoing professional development, ensuring they remain responsive

to both educational and industry trends, which ultimately enhances the quality of instruction and student outcomes.

A collaborative work culture in schools is a powerful approach that encourages teamwork, mutual support, and shared responsibility among teachers and staff, all of which are essential components for fostering a productive and positive educational environment (Khan 2020). In a vocational education setting, where the integration of both academic theory and practical skills is critical, the importance of collaboration becomes even more pronounced. Teachers in SMK Negeri 1 Pabelan often need to combine knowledge from different disciplines, including technical skills and academic subjects, to ensure that students receive a well-rounded education that meets industry standards (Baitullah and Wagiran 2019). A culture of collaboration provides an ideal platform for teachers to exchange ideas, teaching strategies, and best practices, allowing them to learn from each other and improve their teaching methods. This exchange not only benefits teachers by broadening their pedagogical approaches but also creates opportunities for peer mentoring, where more experienced teachers can guide less experienced ones, enhancing the overall skill set within the school. In vocational education, where industries and technologies are constantly evolving, staying updated on the latest trends and practices is crucial. A collaborative culture ensures that teachers have access to the latest industry knowledge, resources, and teaching techniques, enabling them to stay relevant and aligned with current demands (Blau 2020). Moreover, it allows teachers to engage in joint problem-solving, addressing challenges in a more efficient and effective manner. As a result, this collective effort leads to improved teaching effectiveness, which directly benefits student learning outcomes, preparing them to meet the ever-changing demands of the workforce. Therefore, fostering a collaborative culture in VHS not only enhances the quality of instruction but also ensures that students are better equipped with the skills and knowledge needed for success in their chosen fields (Dubey 2019).

The integration of a collaborative work culture in vocational high schools has the potential to transform the way teachers approach their roles. By fostering a supportive and inclusive environment, teachers can feel more empowered to innovate and take risks in their teaching methods. This approach not only benefits teachers by increasing their confidence and competence but also ensures that students receive a high-quality education that prepares them for the workforce. Exploring the role of collaboration in enhancing teacher effectiveness provides valuable insights into improving vocational education systems globally. Despite the critical role of teacher effectiveness in shaping student outcomes and preparing a skilled workforce, many SMK Negeri 1 Pabelan face challenges in fostering environments that support teacher growth and innovation. The dynamic nature of vocational education, which demands continuous adaptation to industry standards and multidisciplinary teaching, underscores the need for a strong collaborative work culture. However, limited research exists on how such collaboration impacts teacher effectiveness in VHS settings. This study seeks to address this gap by exploring how a collaborative work culture influences teachers' professional practices and overall effectiveness.

The main research question guiding this study is: "**How Does a Collaborative Work Culture Enhance Teacher Effectiveness in Vocational High Schools?**"

LITERATURE REVIEW

1. *Teacher Effectiveness and its Role in Vocational Education*

Teacher effectiveness plays a crucial role in the success of any educational system, but it is particularly vital in vocational education, where the goal is not only to impart theoretical knowledge but also to develop the practical skills that students will need in their future careers (Rogers 2024). Effective teachers in vocational high schools must be able to engage students by making lessons both informative and engaging, using innovative teaching strategies that integrate both theory and hands-on practice (Podolsky, Kini, and Darling-Hammond 2019). This ability to adapt and connect with students is essential in vocational settings, where students often have diverse learning needs and varying levels of prior knowledge. Moreover, teacher effectiveness is not solely about individual competence; it is also deeply influenced by external factors such as professional development opportunities, access to teaching resources, and institutional support. Continuous professional development ensures that teachers remain up-to-date with the latest industry standards and pedagogical trends, while institutional support, such as adequate teaching materials and a positive work environment, plays a critical role in enabling teachers to perform at their best (Khatete 2020). In vocational high schools, where teachers are tasked with the dual responsibility of delivering both academic content and practical training, the stakes are even higher. The quality of teaching directly influences students' readiness for the workforce, as it equips them with the specific skills and knowledge required by industries (Vlachopoulos 2021). As industries evolve and technologies advance, the need for teachers to remain adaptable and responsive to these changes is crucial, making teacher effectiveness a fundamental factor in preparing students for successful careers and meeting the needs of the labor market.

2. *Collaborative Work Culture in Educational Settings*

Collaborative work culture is a school environment where teachers and staff actively work together, share responsibilities, and support each other to achieve common goals (Torres 2019). This type of culture promotes an atmosphere of teamwork and mutual respect, where collaboration is seen as a shared responsibility rather than individual efforts. Research has consistently shown that collaboration not only fosters professional growth among educators but also improves teaching practices, enhances student outcomes, and boosts overall job satisfaction (Kim 2022). When teachers collaborate, they have the opportunity to learn from each other, exchange ideas, and refine their teaching methods. This can include practices such as peer mentoring, where experienced teachers guide less experienced colleagues, co-teaching, where two or more teachers share responsibility for teaching a class, and joint curriculum development, where teachers work together to design and implement a cohesive curriculum (Hargreaves 2021). These collaborative practices not only benefit teachers but also create a more dynamic and engaging learning environment for

students. In the context of vocational education, collaboration becomes even more critical.

Teachers in vocational schools often need to integrate technical skills with academic knowledge, and a collaborative culture allows them to align their teaching practices with industry standards (Harden and Laidlaw 2020). In this setting, collaboration can extend beyond the school walls, involving partnerships with industry professionals to ensure that the curriculum is responsive to real-world demands. These partnerships can provide valuable insights into current industry trends, technologies, and best practices, allowing teachers to stay up-to-date and ensure that students are being prepared for the workforce with relevant and cutting-edge skills (Kraft 2019). Theoretical foundations of collaborative work culture, such as social constructivism, suggest that learning is a collective process, with knowledge being constructed through interactions with others. Collaboration in schools, therefore, is not just about sharing tasks but is also a vital mechanism for professional learning and growth. In educational institutions, fostering a collaborative work culture can lead to a more inclusive, innovative, and supportive environment that benefits both teachers and students, creating a stronger foundation for educational success.

3. The Relationship Between Collaboration and Teacher Effectiveness

Research indicates that a strong collaborative culture within educational institutions has a profound positive impact on teacher effectiveness by fostering an environment of innovation, problem-solving, and continuous professional learning (Wang, King, and McInerney 2023). Collaboration among teachers is not merely about sharing the workload; it provides a platform for educators to exchange creative ideas, discuss challenges, and experiment with new teaching strategies. Teachers who engage in such practices tend to feel more supported by their colleagues, which reduces feelings of isolation and burnout (Zakariya 2020). This sense of support and collective responsibility enhances teachers' job satisfaction and motivates them to strive for higher performance levels, ultimately benefiting their students. In vocational high schools, where the complexity of teaching both theoretical knowledge and practical skills is particularly challenging, collaboration proves to be even more beneficial. It allows teachers to integrate knowledge across different subject areas, helping them design interdisciplinary lessons that reflect the interconnectedness of skills required in the workforce (Baier 2019).

This cross-disciplinary collaboration also ensures that teachers remain aligned with industry standards, which is essential in vocational education, where staying updated on the latest technological trends and practices is critical for preparing students for successful careers. Moreover, teachers working in a collaborative environment are more likely to participate in shared professional development activities, ensuring they stay on the cutting edge of both pedagogical advancements and industry changes (Beyer 2022). Studies have shown that such professional development, when conducted collaboratively, has a more lasting and impactful effect on teaching quality than traditional, isolated training. Additionally, collaboration promotes the sharing of best practices, which can lead to the standardization of effective teaching methods across the school. As a result, the collective knowledge and expertise of the teaching staff are leveraged to improve student outcomes, as students benefit from a more cohesive and well-rounded learning experience (Wang 2022). Teachers, by learning from each other and continuously improving their practice, are better able to meet the diverse needs of their students and prepare them for the demands of the labor market.

METHODOLOGY

This study employs a qualitative research design to explore how collaborative work culture enhances teacher effectiveness in SMK Negeri 1 Pabelan. The qualitative approach is chosen to gain in-depth insights into the experiences, perceptions, and practices of teachers within the context of collaboration. This approach enables the researcher to capture the complexities of human interactions and workplace dynamics that cannot be easily quantified. Through an interpretive lens, the study seeks to understand the meanings teachers assign to their collaborative practices and how these practices influence their professional effectiveness. The study uses purposive sampling to select participants who are most relevant to the research objective. Participants include teachers from various departments in selected Vocational High Schools, ensuring diversity in subject areas and teaching experiences. Criteria for selection include a minimum of three years of teaching experience and active involvement in collaborative activities within their schools. The sample size consists of 15–20 teachers to allow for a manageable yet rich dataset. This range ensures the inclusion of diverse perspectives while maintaining the feasibility of conducting in-depth interviews and data analysis.

Data collection involves semi-structured interviews, focus group discussions, and document analysis. Semi-structured interviews are conducted to allow participants to share detailed narratives about their experiences with collaborative work culture. Focus group discussions provide an opportunity for collective insights and reflections, facilitating a deeper understanding of group dynamics and shared practices among teachers. Additionally, school documents, such as meeting notes, collaborative project plans, and professional development records, are analyzed to corroborate the findings from interviews and discussions. All data collection processes are recorded, transcribed, and anonymized to ensure accuracy and confidentiality. Thematic analysis is employed to analyze the qualitative data. This method involves identifying,

organizing, and interpreting patterns or themes within the dataset. The analysis follows a systematic process, beginning with familiarization with the data, generating initial codes, and then grouping these codes into themes related to collaborative work culture and teacher effectiveness. NVivo software is used to assist in managing and organizing the data efficiently. To enhance the credibility of the findings, member checking is conducted by sharing preliminary results with participants to ensure their accuracy and resonance with their experiences. Triangulation of data from interviews, focus groups, and document analysis further strengthens the reliability of the study.

RESULT

1. Teachers' Perceptions of Collaborative Work Culture

Participants consistently emphasized the importance of a collaborative work culture in fostering a supportive and motivating work environment. Teachers reported that collaboration allowed them to share teaching strategies, exchange ideas, and solve problems collectively, which reduced feelings of isolation. Many participants highlighted that regular meetings, peer mentoring, and joint lesson planning sessions contributed significantly to their sense of belonging and professional growth. These practices also created opportunities for mutual learning, as teachers could adopt innovative techniques introduced by their colleagues.

2. Enhancing Teaching Practices Through Collaboration

The findings revealed that collaboration directly influenced the quality of teaching practices. Teachers stated that co-teaching and interdisciplinary projects enabled them to combine their expertise, resulting in more comprehensive and engaging lessons for students. For instance, vocational teachers in technical subjects collaborated with academic teachers to integrate theoretical concepts into practical activities. This integration not only enriched the learning experience but also ensured that students could apply their knowledge in real-world scenarios. Participants also noted that collaborative feedback sessions helped them refine their teaching methods and address challenges more effectively.

3. Professional Development Opportunities in Collaborative Environments

Participants highlighted that a collaborative culture provided ongoing professional development opportunities. Through collaborative workshops, training sessions, and peer-led discussions, teachers were able to stay updated on industry trends and pedagogical innovations. Several teachers mentioned that engaging in collaborative initiatives such as curriculum development and student project supervision enhanced their skills and knowledge. They also appreciated the role of collaboration in building confidence, as working together reduced the fear of trying new methods or technologies in the classroom.

4. Challenges and Barriers to Collaboration

While most participants praised the benefits of a collaborative work culture, some challenges and barriers were also identified. Time constraints were a common issue, as teachers struggled to balance their individual workloads with collaborative activities. Additionally, a few participants mentioned resistance from colleagues who preferred working independently or lacked trust in the collaborative process. Differences in teaching styles and communication gaps also occasionally hindered effective collaboration. Despite these challenges, participants agreed that the overall impact of collaboration on their effectiveness outweighed the difficulties.

5. Impact on Student Outcomes

Many teachers observed a positive correlation between their collaborative practices and improved student outcomes. Participants noted that students benefited from the diverse teaching approaches and integrated lessons that emerged from collaboration. They reported increased student engagement, better understanding of concepts, and enhanced practical skills among students. Furthermore, teachers believed that collaboration contributed to creating a more cohesive school environment, where students felt supported and motivated by the collective efforts of their educators.

DISCUSSION

1. Teachers' Perceptions of Collaborative Work Culture

The findings from this study emphasize the critical role that a collaborative work culture plays in creating a supportive and enriching environment for teachers in SMK Negeri 1 Pabelan. The importance of collaboration goes beyond simply improving teaching practices; it also serves as a key factor in reducing professional isolation, which is a common challenge for educators. In the context of VHS, where teachers often juggle multiple responsibilities related to both academic and technical instruction, collaboration provides an essential opportunity for teachers to come together, share knowledge, and support each other in their teaching roles. This collective approach fosters a sense of community among educators, where the shared goal of student success brings teachers closer together. This finding aligns with existing literature that consistently points to the emotional and professional benefits of collaboration, particularly in reducing feelings of isolation and stress.

Teachers who collaborate frequently tend to experience higher levels of job satisfaction, as they feel more connected to their colleagues and supported in their daily tasks. The sense of belonging that comes from engaging in collaborative practices contributes to increased motivation, which directly influences teacher effectiveness. When teachers feel that their ideas and contributions are valued within the school community, they are more likely to be invested in their roles and strive for higher performance standards. The study also highlights the importance of both formal and informal interactions in fostering collaboration. Regular formal meetings, such as planning sessions or team teaching activities, as well as informal exchanges, such as casual conversations or peer observations, play a significant role in building strong working relationships among teachers.

These interactions are key to creating an environment where teachers feel supported and empowered. Based on these findings, it is suggested that school administrators take proactive steps to facilitate these forms of interaction by providing dedicated time for collaboration and encouraging a culture of open communication. Prioritizing such initiatives will help cultivate a positive work culture that not only enhances teacher performance but also contributes to improved student outcomes, as motivated and supported teachers are more likely to deliver high-quality instruction and meet the needs of their students.

2. *Enhancing Teaching Practices Through Collaboration*

The integration of interdisciplinary collaboration and co-teaching emerged as a powerful approach for enhancing teaching quality in vocational education, where the need to combine both theoretical understanding and practical skills is paramount. Teachers who engaged in collaborative practices reported that working together allowed them to blend academic content with real-world applications more effectively, creating lessons that were not only engaging but also relevant to students' future careers. This interdisciplinary approach ensures that students are exposed to a holistic view of the subject matter, where they can understand the theoretical foundation and immediately apply it in practical, industry-related contexts.

The alignment of this finding with existing literature is evident, as numerous studies have shown that collaborative teaching strategies foster creativity, enhance instructional innovation, and improve student engagement. When teachers from different disciplines collaborate, they bring diverse perspectives and approaches to the classroom, which can lead to more dynamic and engaging lessons. Furthermore, teachers involved in collaborative practices benefit from the opportunity to receive constructive feedback from their peers. This peer review process allows teachers to reflect on their teaching methods and refine their practices based on the suggestions and insights provided by colleagues. In vocational education, where the integration of technical skills and academic knowledge is essential, the need for a multidisciplinary approach is even more pronounced. Teachers from different subject areas—whether in technical fields such as engineering or health sciences or academic subjects such as mathematics or languages—must work together to ensure that their students receive a well-rounded education.

Collaborative efforts between these disciplines allow teachers to design lessons that connect academic theory with hands-on skills training, giving students a deeper understanding of how their learning applies in the workplace. The results of this study suggest that schools should actively encourage and facilitate interdisciplinary collaboration as a means of bridging gaps between subjects and creating a more integrated curriculum. This approach can provide students with a comprehensive learning experience, preparing them not just with technical skills, but with a broader knowledge base that will serve them well in the workforce. As such, schools should consider policies that promote cross-disciplinary cooperation, such as team-teaching programs, joint planning sessions, and professional development opportunities for teachers to work across subject boundaries.

3. Professional Development Opportunities in Collaborative Environments

The study emphasizes the critical importance of collaboration in fostering professional development, particularly in the context of vocational education, where staying aligned with rapidly evolving industry standards and pedagogical practices is crucial. Teachers in vocational schools often face the challenge of keeping their skills and knowledge up-to-date with the latest technological advancements and trends in their respective fields. In a collaborative environment, teachers have continuous opportunities to engage in shared learning, which allows them to stay informed about the latest developments both in teaching methods and in industry practices. This ongoing exchange of knowledge is invaluable, as it enables educators to remain relevant and ensure that their students are receiving the most current and practical education possible. The study supports the idea that professional development is most effective when it is integrated into daily practice through collaborative activities, rather than through isolated workshops or one-off training sessions. While traditional professional development programs can offer useful information, they often lack the practical application and ongoing support that collaborative environments provide.

Collaborative practices, such as co-teaching, peer mentoring, and joint curriculum planning, not only promote professional growth but also empower teachers to be more confident in their teaching approaches. The willingness to innovate and experiment with new teaching methods, as expressed by the participants in this study, reflects the empowering nature of peer-led professional development. When teachers work together, they build a sense of trust and camaraderie, which in turn encourages risk-taking and the adoption of new, innovative teaching strategies. This collaborative support system is particularly empowering in vocational education, where educators must integrate both academic theory and practical skills. The study suggests that fostering a culture where teachers take an active role in their professional development can have significant positive effects on their teaching practices. Schools should therefore consider embedding collaborative practices into their professional development programs, as this approach ensures that development is not just a one-time event but an ongoing process that remains relevant to the ever-changing needs of both the education sector and the industries vocational schools serve. By integrating collaboration into professional development, schools can create a sustainable environment of continuous improvement that benefits both teachers and students.

4. *Challenges and Barriers to Collaboration*

While the study highlights the significant benefits of collaboration, it also identifies several challenges that can hinder its full effectiveness in vocational schools. One of the most prominent barriers is time constraints, as teachers often have demanding schedules that leave little room for collaborative activities. With the pressure of preparing lessons, grading assignments, and fulfilling administrative duties, teachers may struggle to find time for meaningful collaboration. Additionally, resistance to change can also pose a significant challenge. In some cases, educators may be hesitant to adopt new collaborative practices, especially if they are accustomed to working independently or if they perceive these changes as a disruption to their established routines. Communication gaps further complicate the situation, as ineffective communication can lead to misunderstandings, missed opportunities for collaboration, and a lack of cohesion among the teaching staff.

These barriers are consistent with previous research, which has found that time management issues and cultural resistance to collaboration are common obstacles in educational settings. However, the study also underscores the importance of addressing these challenges in order to unlock the full potential of collaborative work in vocational education. To overcome these barriers, strategic interventions are necessary. Schools need to allocate dedicated time for collaborative activities, ensuring that teachers have space in their schedules to engage in joint planning, co-teaching, or peer mentoring without the added stress of competing priorities. Additionally, fostering a culture of trust and openness among staff is crucial to breaking down resistance and encouraging participation in collaborative efforts. When teachers feel supported and valued, they are more likely to embrace new practices and engage in teamwork. School leaders play a central role in mitigating these challenges by establishing policies and structures that prioritize and facilitate collaboration. For example, introducing team-building exercises or offering communication training could help teachers feel more comfortable with collaboration, improve interpersonal relationships, and enhance the overall effectiveness of teamwork. By creating a supportive and structured environment that addresses these barriers, school leaders can empower teachers to collaborate more effectively, ultimately improving the quality of education and better preparing students for the workforce.

5. *Impact on Student Outcomes*

The positive impact of collaborative work culture on student outcomes highlights the far-reaching benefits of teacher collaboration within vocational education settings. When teachers engage in collaborative practices, they bring diverse teaching approaches and methodologies into the classroom, which enriches the learning experience for students. This integration of varied teaching styles and expertise allows for more comprehensive lessons that appeal to different learning preferences, thereby increasing student engagement and understanding. Collaborative teachers can also provide cohesive support to students by working together to address learning challenges, share insights on individual student needs, and create a more unified approach to instruction. As a result, students are more likely to develop a deeper understanding of both theoretical concepts and practical skills, which are crucial for their future careers.

This finding aligns with existing research that links teacher collaboration to improved student achievement, as studies have consistently shown that a collaborative work culture contributes to more effective teaching and learning.

In vocational education, where the primary goal is to prepare students for the workforce, these improvements are particularly significant. By working collaboratively, teachers can ensure that students receive instruction that is not only academically sound but also relevant to industry standards and real-world applications. This holistic approach to teaching enables students to develop a broader set of competencies, making them more adaptable and capable of thriving in the workplace. Furthermore, the study suggests that collaboration creates a ripple effect, where enhanced teacher effectiveness directly translates into better student performance. As teachers collaborate, they refine their skills, share best practices, and continuously improve their teaching methods, which ultimately leads to improved learning outcomes for students. This, in turn, prepares students with the knowledge and skills necessary to enter the workforce confidently and successfully. Given these findings, it is evident that schools should invest in fostering collaborative practices, not only to improve teacher performance but also to enhance overall educational outcomes. By creating a supportive environment for collaboration, schools can empower educators, improve student achievement, and better equip students for the demands of the job market.

CONCLUSION AND RECOMMENDATION

This study underscores the significant role of a collaborative work culture in enhancing teacher effectiveness in SMK Negeri 1 Pabelan. The findings indicate that collaboration among teachers fosters a sense of community, enriches teaching practices, and provides continuous professional development opportunities, all of which contribute to improved student outcomes. Teachers who engaged in collaborative practices reported greater confidence, adaptability, and innovation in their teaching methods, which in turn positively impacted student engagement and skill development. However, the study also identified challenges such as time constraints, resistance to change, and communication barriers that need to be addressed to fully capitalize on the benefits of collaboration.

To strengthen the positive impact of collaborative work culture, it is recommended that school administrators allocate dedicated time and resources for collaborative activities, incorporate professional development programs that focus on peer learning and effective communication, and foster a culture of trust and openness through team-building exercises and transparent leadership practices. Additionally, schools should establish systems for monitoring and evaluating the effectiveness of collaboration, using feedback to refine strategies. Finally, to ensure alignment with industry needs, collaboration with industry professionals should be promoted, offering teachers the opportunity to engage in joint projects and professional development initiatives. By implementing these recommendations, Vocational High Schools can create a supportive environment that enhances teacher effectiveness, ultimately leading to improved educational outcomes for students and better alignment with workforce demands.

FURTHER STUDY

For future studies, it would be valuable to explore the long-term impact of collaborative work cultures on both teacher effectiveness and student outcomes in Vocational High Schools across diverse geographical regions and educational systems. A longitudinal approach could provide deeper insights into how sustained collaboration influences teachers' professional growth, job satisfaction, and retention, as well as how these factors translate into long-term student success. Additionally, future research could examine the role of technology in facilitating collaboration, particularly in schools with limited resources. Investigating the experiences of students who directly benefit from these collaborative practices, such as through improved engagement and career readiness, would further enrich the understanding of the full impact of teacher collaboration in vocational education. Comparative studies involving schools with different levels of collaboration could also offer valuable insights into best practices and the conditions necessary for fostering a collaborative culture in diverse educational contexts.

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