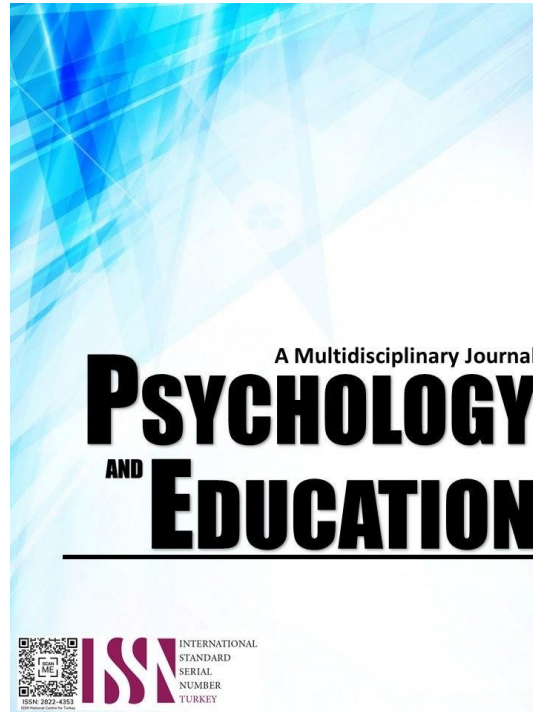


# **ETHICAL CLIMATE, CHARISMATIC LEADERSHIP OF SCHOOL HEADS AND TEACHERS' SENSE OF SELF-EFFICACY: A STRUCTURAL EQUATION MODEL ON TEACHER ENGAGEMENT**



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## Ethical Climate, Charismatic Leadership of School Heads and Teachers' Sense of Self-Efficacy: A Structural Equation Model on Teacher Engagement

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### Abstract

This study was conducted to determine best-fit model on teacher engagement as influenced by ethical climate, charismatic leadership of school heads and teachers' sense of self-efficacy in public elementary schools in Region XI, Philippines. It was conducted from August to December 2022. The study used quantitative, non-experimental correlational research using Structural Equation Model (SEM). The 400 teachers among public elementary schools were determined using the stratified sampling procedure. Mean, Pearson  $r$ , and SEM were used as statistical tools. Moreover, adapted survey questionnaires used were modified to contextualize to the local setting. The results showed that the levels of ethical climate and charismatic leadership of school heads, and teacher engagement were very high while the teachers' sense of self-efficacy was high. Further, when each exogenous variable was correlated with teacher engagement, results showed that the ethical climate, charismatic leadership of school heads and teachers' sense of self-efficacy were significantly correlated with teacher engagement. Model 3 came out as the best-fit model on teacher engagement. Further, results showed that the best fit model was model 3 showing the direct causal relationships of ethical climate, charismatic leadership of school heads and teacher's sense of self efficacy on teacher engagement. Furthermore, structure modifications revealed that teacher engagement was defined by its retained indicators, namely: vigor, and absorption. On the other hand, ethical climate was described by its domains: laws and rules, efficiency and independence. Charismatic leadership was determined by its retained indicators, namely: strategic vision and articulation, sensitivity to member needs and personal risk. Finally, teachers' sense of self-efficacy was measured by its domains: efficacy in student engagement and efficacy in instructional strategies. This implies that schools may focus on improving teacher engagement by setting school ethical norms and expectations with improved teachers' efficacy coupled with enhanced charismatic leadership behavior of school heads.

**Keywords:** *educational management, ethical climate, charismatic leadership, self-efficacy, teacher engagement*

### Introduction

Engagement of employees at work is declining and disengagement among employees is gradually increasing. Low percentage of work engagement has been stagnant for years. Low engagement stems from a manager's ungratefulness, communication gap and misalignment with the mission of the organization (Brook, 2019; Bongcayot & Guhao, 2020; Crabtree, 2013; Morgan, 2018). In the educational context, poor teacher engagement at work has been one of the major concerns of educational leaders. It was observed that disengaged teachers are less emotionally connected at work and avoid devoting much of their time in exerting more efforts in their job.

Moreover, teachers who have poor work engagement are no longer happy, which weakens overall organizational performance. Some of the behaviors shown by disengaged teachers are absenteeism which creates a drain on school productivity. These work engagement risks are due to numerous factors at schoolwork (Hastings & Agrawal, 2015; Konermann, 2012; Wilson, 2018).

Relatively, work engagement is deemed as important for an organization in strengthening ties between employees, in keeping their employees engaged and in achieving high productivity rates. Engaged employees who display intensified commitment at work tend to spend more time and effort at work which improves productivity and work quality for both modern-day public and private organizations (Bakker et al., 2014; Baldoni, 2013; Bongcayot & Guhao, 2020; Brook, 2019; Gebour, 2009). For schools, teachers' engagement at work is important since it positively affects school organizations in general. Maintaining positive work engagement of teachers at work results to school productivity, performance, and effectiveness. Thus, higher level of teachers' work engagement makes school employees become more productive, vigorous, dedicated, and enthusiastic to perform duties and responsibilities as part of the dynamic educational institution (Deligero & Laguardo, 2014; Furst, 2014; Gould, 2016; Robinson et al., 2014; Schaufeli & Bakker, 2014; Schweitzer, 2014; Steger et al., 2013).

Given the importance of work engagement, the researcher performed a thorough literature review of potential factors that could influence it. There are various factors which affect work engagement of teachers such as school ethical climate, charismatic leadership, and sense of self-efficacy. According to Yener, Yaldiran and Ergun (2012), work engagement is positively and significantly related with ethical climate. Social responsibility climate has a greater effect on work engagement, especially on dedication dimension of work engagement. Also, ethical climate is correlated with dedication and absorption dimensions than vigor dimensions.

On the other hand, various authors (Shamir, House, & Aethur, 2013; Truffle, 2012) revealed that charismatic leadership has positive relationship with work engagement. In addition, sense of self-efficacy is also linked to work engagement. Garg Sethi and Gupta (2017) revealed that employees who are highly engaged are also high on the self-efficacy dimension. It can be assumed that there is a positive relationship between self-efficacy and the three dimensions of employee engagement such as vigor, dedication, and absorption.

This study is anchored on the Leadership–Membership Exchange (LMX) theory of Dansereau, Graen, and Haga (1975) which states how leadership might influence work engagement as that of the relationship between a leader and his subordinates. Furthermore, this study is also anchored on the proposition of Li, Castaño, and Li (2018) which states that leadership styles significantly influenced employees' work engagement; specifically, transformational and transactional leadership positively predicted employees' work engagement. Further, Gozukara and Simsek (2016) revealed that the behaviors of leaders result in higher levels of follower commitment and engagement at work. Moreover, Blomme, Kodden, and Beasley-Suffolk (2015) had pointed out that the different leadership styles influence engagement, and defined three classes of leadership styles as follows: inclusive, poor and rich. It was stated that a rich leadership style will lead to higher levels of engagement.

This is relative to the propositions which explains that charismatic leadership influences work engagement. Charismatic leadership has positive relationship with work engagement. Truffle (2012) stated that charisma is useful for persuading people to accept a leader's ideas and highly effective and engaged groups usually work for their leader who has got shared vision and clear envisioned future. Also, Shamir, House and Authur (2013) in their research also reported that charismatic leadership had a positive impact on their followers, especially in engaging with the mission articulated by the leader.

Moreover, in 1988, Martin and Cullen created an ethical climate model called Ethical Climate Theory (ECT) both based on ethical philosophy and sociological theory of reference groups. The ethical philosophical dimension is inspired from Koh's (1984) moral development study. The locus of analysis which constitutes the sociological dimension of ECT completes the classification of ethical climate types. Victor and Cullen (1988) based the sociological dimension of ECT on sociological theory of Merton (1968) and its application to organizational contexts.

In conjunction, the study is anchored with the existing propositions of Yener, Yaldiran and Ergun (2012), that work engagement is positively and significantly related with ethical climate. The investigation showed that that social responsibility climate has a greater effect on work engagement, especially on dedication dimension of work engagement. It is also displayed the stronger relationship of ethical climate with the dedication and absorption dimensions than the vigor dimension of work engagement. Thus, organizations need to have a set of distinctive ethical standards and values and an organization-specific ethical climate. Organizations, especially the top management, should recognize the importance of work engagement and should work harder to achieve and improve it, especially in terms of improving ethical management style and managing to increase work engagement.

On the other hand, according to the Conservation of Resources (COR) Theory COR theory of Hobfoll (1989), self-efficacy enhances work–life balance and work engagement, through a self-fulfilling cycle in which employees achieve what they believe they can accomplish, and in the process, build other skills and personal resources to manage their work and family challenges. This theory established the idea that self-efficacy induces a range of positive outcomes such as increased work engagement.

This study examined the conceptual framework and hypothesized models to determine their fit in explaining teacher engagement in Region XI. The first conceptual paradigm demonstrates the exogenous variables' direct influence: ethical climate, charismatic leadership of school heads and teachers' sense of self efficacy towards the endogenous variable, teacher engagement as supported by theories and studies.

The first exogenous variable is ethical climate. Current literature presents that effective ethical climate may augment the possibility of organizational members to conduct themselves ethically (Bernaldez&Gempes, 2016; Mayer, Kuenzi, Greenbaum, Bardes, & Salvador, 2009; Toor & Ofori, 2009; Zhu, 2006). In fact, positive ethical climate within an organization increases the motivation and organizational commitment of its associates (Cullen, Parboteeah& Victor, 2003; Hairunnisa, Ho, Ros & Nurhazirah, 2012; Schwepker, 2011; Shafer, 2009; Tsui& Huang, 2008; Vitell & Hidalgo, 2006). Hence, organizational leaders should significantly contribute to develop the sustainability of an ethical work environment (Ireland & Hitt, 2005; Neubert, Carlson, Kacmar, Roberts & Chonko, 2009; Sama & Shoaf, 2008).

In conjunction, ethical climate is a subcomponent of an organization's culture. It is a component of the person's work setting as observed by the members. Likewise, ethical climate is the psychological atmosphere in which specific individual manners occurs. Apparently, ethical climate is much related to organizational culture. It was suggested that affirmative ethical organizations develop because of the existence of organizational components. Those organizational components or practices are informal and formal structure of ethical organization, genuine leadership, systems procedures that are associated with ethical behaviors, and an ethical culture sustained by significant ethical characteristics among members who build a positive ethical climate (Buchan, 2006; Cullen et al., 2003; Shacklock et al., 2011; Verbos, Gerard, Forshey, Harding & Miller, 2007).

The first dimension of ethical climate is the laws and rules. A law-and-order climate is when organizational members follow specific codes of conduct. The rule in ethical climate has something to do with obeying established procedures, rules and policies in the organization. In comparison, the laws climate relies on concrete external genuine laws while a rules climate depends on internal professional policies or codes. Relatively, work forces and superiors recognize that deviating from the rules may cost them their work and profession. This could repress creativity and could also overlook valid issues that organizational workers may encounter. On the other hand, difficulties might not be resolved due to some organizational workers who are frightened to violate the rules (Lombardo, 2015; Shacklock et al., 2011).

In addition, members of the organization recognizing the rules ethical climate perceive themselves making decisions by following the general rules and codes of conduct set by the organization. Every decision of the organizations is driven by the established rules and standards. In fact, a related study found out that public accountants see a rules climate, as defined in the empirically derived ethical climate typology, while private accountants initiate more productivity and personal morality ethical climate types, as depicted in another notional ethical climate typology. Further, it was suspected that the internal and external sets of principles progressively being executed in industry might have an impact on internal decisions; hence, the impression of the present ethical atmosphere (Martin & Cullen, 2006; Venezia, Venezia & Hung, 2010).

The second dimension of ethical climate is caring. Caring climate depends on the kindness ethical criterion. In this atmosphere the most vital concern is what is best for others and individuals pay special mind to each other and the essential objective is to offer the best useful for the best number of individuals (Filipova, 2007; Ghorbani & Razavi, 2011; Suhonen, Stolt, Katajisto, Charalambous & Olson, 2015).

In parallel, organizational members seeing a caring climate see organizational workforces having conventions about sympathy toward the improvement of others. Every decision in the caring climate is made by thought to the general sympathy toward decision results influencing the development of others. Researchers have noticed that organizational members prefer, with more prominent fulfillment, to work in a caring atmosphere (Cullen et al., 2003; Elci & Alpan, 2009; Martin & Cullen, 2006; Shacklock et al., 2011).

The third dimension of ethical climate is independence. The independence climate is linked with the principle ethical criterion. In this climate, persons are anticipated to adhere to their own individual and ethical beliefs. All persons decide for themselves what is ethical or unethical; therefore, they are directed by their own individual morals (Ghorbani & Razavi, 2011; Suhonen et al., 2015; Tsui & Huang, 2008).

The fourth dimension of ethical climate is instrumental. This dimension is related with egoistic criterion and its essential objective is to give individual advantages. In this climate individuals ensure their own benefit above whatever else and are for the most part out for themselves (Filipova, 2007; Ghorbani & Razavi, 2011; Suhonen et al., 2015; Tsui & Huang, 2008). Moreover, people inside the organization who see an instrumental climate recognize the organization as having the standards and expectations that empower ethical decision-making from an egoistic point of view (Lemmergaard & Lauridsen, 2008; Martin & Cullen, 2006; Shacklock et al., 2011).

The last dimension of ethical climate is efficiency which was added into Victor and Cullen; identified domains of ethical climate. It involved ideas of organizational efficiency such the most efficient way is dependably the right way in the organization, and the significant obligation of individuals in the organization is to consider effectiveness first. Besides, every individual in the organization is relied upon most importantly to perform efficiently. Additionally, in an efficiency climate, the organizational members are anticipated to perform for the benefit of the bigger economic and social system. In a study conducted, some research participants perceived this climate as less dominant among their organizations (Cullen et al., 2003; Putranta, 2008; Shacklock et al., 2011).

The second latent variable is charismatic leadership. It was explained that charismatic leadership is basically the method of encouraging behaviors in others by way of eloquent communication, persuasion and force of personality. Charismatic leaders motivate followers to get things done or improve the way certain things are done. This is accomplished by conjuring up eagerness in others to achieve a stated goal or vision. In essence, the charismatic leadership style has its basis in a form of heroism. This leadership style is almost of divine origin (Kroc, 2017).

Further, the charismatic leadership style relies on the charm and persuasiveness of the leader. Charismatic leaders are driven by their convictions and commitment to their cause. Also, charismatic leaders are sometimes called transformational leaders because they share multiple similarities. Their main difference is focus and audience. Charismatic leaders often try to make the status quo better, while transformational leaders focus on transforming organizations into the leader's vision (Evje, 2018; Riggio, 2012).

The first indicator of charismatic leadership is strategic vision and articulation. This domain describes the qualities of charismatic leaders and how they gain commitment to their vision and the mission of the organization. It draws on the main theories of charismatic leadership to present the key behaviors that distinguish charismatic leaders from non-charismatic leaders. The domain describes how charismatic leaders use visionary language to gain commitment to their vision and how they tap into follower values to arouse emotion. Charismatic leaders are powerful communicators who can articulate a vision meaningful to their followers. They are also excellent role models for they emulate the behaviors that they describe. The literature provides examples of the linguistic techniques that charismatic leaders use to motivate others. The focus on charismatic language also provides evidence that managers can be trained to be more charismatic in how they lead others within the organization (Towler, 2019).

The second indicator is sensitivity to the environment. Leaders who exhibit humility have developed a heightened sensitivity to the feelings of others. Great leaders are very good at understanding the complex needs of their people and how to facilitate a context that can engage others' utmost effort. But to do this well, they themselves must be acutely sensitive. In addition, sensitivity is an often misused and poorly understood concept. In business, it is generally talked about to describe a weak mind-set, one that responds to workplace conflict with neurotic agitation. The term sensitive is often a pejorative, suggesting that a person is neurotically worried about what other people think of him or her (Menkens, 2011).

Accordingly, environmental or organizational sensitivity is a key managerial trait. Here are a few ways a leader to develop it. First, when people seem to be experiencing low morale or having difficulty, talk with them to find out what is going on. Sometimes people will not want to say much, but they will appreciate that you noticed and showed concern. Second, identify and prioritize longstanding or unresolved conflicts within your team. Develop a strategy to address them. People may welcome the opportunity to talk openly about issues that have been simmering and will have excellent ideas for solving them. Third, notice if there are things in the work environment that you can change. Not all problems require financial or upper-management solutions; many can be resolved through addressing them creatively. Lastly, ask your employees what you can do to be a better leader or a better boss for them. Implement some of their recommendations to show that you take their input seriously (Blazek, 2011).

The third indicator is sensitivity to member needs. In this domain, the leader carefully evaluates his/her followers' needs. The fourth indicator is personal risk. This involves presenting self-confidence, demonstrating belief in the potential outcome of the vision. The last indicator is unconventional behavior. In this domain, the leaders create trust and commitment in the followers and provides a role model for followers (Ray, 2011).

Likewise, the third latent variable is teachers' sense of self-efficacy. This belief that they can have a positive effect on student learning, appears to be related to teachers' classroom management approaches. In addition, self-efficacy has been widely researched. It was being posited that self-efficacy is the ability of a person to judge how they will react to a situation and the influence they have on the outcome of a situation. There are four primary sources of self-efficacy which are the mastery experiences, vicarious experiences, social persuasion and physiological factors. In other words, the belief that one possesses the ability to perform their job or tasks with mastery is dependent upon previous experiences, training, and environment (Page, Pendergraft & Wilson, 2014; Putman, 2012; Woolfolk, Rosoff & Hoy, 2010).

Furthermore, most of the studies conducted on teacher self-efficacy which focused on differences in the years of experience teachers had spent in the field of education and it was found that this variable is unrelated to teacher efficacy. Many studies also focused on comparing pre-service and classroom teachers and they found that classroom teachers showed a higher level of efficacy in regard to their implementation of new instructional practices (Fives & Buehl, 2009; Page et al., 2014; Putnam, 2012; Tschannen-Moran & Woolfolk Hoy, 2011; Tanriseven, 2012; Wolters & Daugherty, 2017).

Relatively, several studies have demonstrated that a strong sense of efficacy is related to enthusiasm, higher motivation, greater effort, persistence, and resilience across the span of a teaching career (Coladarci, 2012; Evans & Tribble, 2016; Glickman & Tamashiro, 2012; Jennett, Harris & Mesibov, 2013). Moreover, there is some evidence that teacher efficacy is related to academic achievement and teacher behaviors known to foster academic achievement as well as with important student cognitions such as performance expectancies and appraisals and efficacy for achievement. More-efficacious teachers, relative to their less-efficacious peers, also are more likely to adopt change proposals associated with formal innovations and staff development programs (Ashton, 2014; Ashton & Webb, 2016; Berman & McLaughlin, 2007; Dembo & Gibson, 2015; Gibson & Dembo, 2014; Greene, Anderson, & Loewen, 2008; Guskey, 2008; Hoy & Woolfolk, 2010; Poole, Okefor & Sloan, 2009; Rose & Medway, 2011; Smylie, 2008; Soar & Soar, 2012).

Similarly, teacher efficacy has been linked to parent involvement in school activities. It was found that teacher efficacy, aggregated at the school level, was the strongest or among the strongest predictors of five dimensions of parental involvement. Perhaps consistent with this is the finding that more-efficacious teachers, relative to their less efficacious colleagues, are less likely to regard teacher-parent relations as a source of stress (Coladarci, 2012; Hoover-Dempsey, Bassler & Brissie, 2007; Parkay, Olejnik & Proller, 2016).

The first indicator of teacher sense of efficacy is the efficacy in student engagement. Efficacy in student engagement refers to how teachers can do to get through to the most difficult students and help them think critically. It includes the ability of teachers to motivate students who show low interest in schoolwork and get them to believe they can do well in schoolwork. Further, this efficacy refers to the how much teachers can do to help their students' value learning and foster their creativity. Highly efficacious teachers improve the understanding of a student who is failing and assist families in helping their children do well in school (Capa, 2015; Chang & Engelhard, 2015; Page et al., 2014; Tschannen-Moran & Woolfolk Hoy, 2001).

The second indicator is efficacy in instructional strategies. This refers to how teachers can respond to difficult questions from the students and can effectively gauge student comprehension of what they have taught. In the same manner, it refers to what extent teachers can craft good questions for the students and how they can adjust lessons to the proper level for individual students. Also, teachers with high efficacy are those who use a variety of assessment strategies, provide an alternative explanation and example when students are confused, implement alternative strategies in the classroom, and provide appropriate challenges for very capable students (Capa, 2015; Chang & Engelhard, 2015; Page et al., 2014; Tschannen-Moran & Woolfolk Hoy, 2001).

The latent endogenous variable is teacher engagement. It is presented that work engagement is a motivation concept that refers to the voluntary allocation of personal resources directed at the range of tasks demanded by a particular organizational role. Two core conceptual dimensions which are energy and involvement underpin work engagement with three domains of engagement often posited: physical, emotional, and cognitive. In some cases, these three domains are subsumed under a higher-order engagement construct, whereby the individual domains are experienced simultaneously or holistically (Bakker et al., 2011; Christian, Garza & Slaughter, 2011; Rich, LePine & Crawford, 2010; Sonnentag, 2013).

In consonance, in the field of education, a high level of teacher engagement, which is defined as having commitment and enthusiasm is essential for the success of high schools and is a contributing factor to academic achievement. Engagement at work has been described as an employee's interest in, enthusiasm for and investment in the job. Further, it is defined as having energy, involvement, and efficacy. Other also define it as a positive, fulfilling, work related state of mind that is characterized by vigor, dedication, and absorption (Basikin, 2017; Kirkpatrick, 2017; Maslach, Schaufeli & Leiter, 2011; Rutter & Jacobson, 2016; Schaufeli et al., 2012).

Further, engaged teachers are concerned about the quality of education they deliver, and that concern is observable in their classroom practices. Engaged teachers search for new ideas, implement best teaching practices, modify instruction to meet the instructional needs of their students have high expectations for their students take responsibility for student learning frequently monitor student progress and provide students with feedback (Boaler, 2014; Cotton, Dollard, & de Jonge, 2012; Marzano, 2013; McLaughlin, Pfeifer & Stanford University Policy Institute, 2016; Rutter & Jacobson, 2016; Tyler & Boelter, 2018).

The first indicator is vigor. Vigor is one of the aspects of work engagement that implies high levels of energy and mental resilience while working. There is also a determined investment in the actual work, together with high levels of persistence even when faced with difficulties. This aspect can be determined based on Atkinson's motivational theory. Motivation is strength of doing work or resistance against that. So, strength and resistance are addressed as aspects of work engagement and their concept is constant with popular definition of motivation (Latham & Pinder, 2015; Shekari, 2015).

The second indicator is dedication. Dedication is an individual's deriving a sense of significance from work, feeling enthusiastic and proud about the given job, and feeling inspired and challenged by the job (Shekari, 2015; Song, Kolb, Lee & Kim, 2012).

The last indicator is absorption, which refers to a sense of detachment from your surroundings, a high degree of concentration on your job, and a general lack of conscious awareness of the amount of time spent on the job. Further, absorption means concentration and being engrossed in people's work, whereby passing time will be intangible and being detached from the job has some difficulties for them. Furthermore, it is pleasurable to have job experience for individuals. They do that, only for having that and paying high expenditure for a job is not such important issue than it is for the others (Hayati, Charkhabi & Naami, 2014; Rayton & Yalabik, 2014; Shekari, 2015). In conjunction, several related studies revealed the relationship of the variables such as the ethical climate, charismatic leadership, sense of self-efficacy and work engagement.

According to the study of Yener, Yaldiran and Ergun (2012), work engagement is positively and significantly related with ethical climate. The investigation showed that that social responsibility climate has a greater effect on work engagement, especially on dedication dimension of work engagement. It also displayed the stronger relationship of ethical climate with dedication and absorption dimensions than vigor dimension of work engagement. Thus, organizations need to have a set of distinctive ethical standards and values and an organization-specific ethical climate. Organizations, especially the top management, should recognize the importance of work engagement and should work harder in order to achieve and improve it especially in terms of improving ethical management style and managing to increase work engagement.

Also, charismatic leadership influences work engagement. Charismatic leadership have positive relationship with work engagement. Truffle (2012) stated that charisma is useful for persuading people to accept leader's ideas, and highly effective and engaged groups, who usually work for their leader who has got shared vision and clear envisioned future. Also, Shamir, House and Authur (2013) in their research also reported that charismatic leadership had a positive impact on their followers, especially in engaging with the mission articulated by the leader.

Further, sense of self-efficacy is also linked to work engagement. Garg Sethi and Gupta (2017) revealed that employees who are highly engaged are also high on the self-efficacy dimension; they are highly confident that they would be able to meet the demands either of the work or of the environment. Hence, it can be assumed that there is a positive relationship between self-efficacy and the three dimensions of employee engagement such as vigor, dedication, and absorption.

Furthermore, the foregoing presentation and discussion of various literatures have helped in bringing into focus the important variables of the study, ethical climate, charismatic leadership, teachers' sense of self-efficacy and teacher engagement. These served as support to the results and findings of the study.

Moreover, the Structural Equation Model (SEM) is essential to arrive at the best fit model. The proposed model illustrates the following: the oval shape represents the latent variables of the study; the rectangular figures connected to the ovals represent the measured indicators of a latent construct, the single-headed arrow signifies a direct influence from one variable to another; while the double headed arrow indicates a relationship.

In the Hypothesized Model 1 illustration in Figure 1 reflected the correlation of the three latent exogenous variables and their influence to the latent endogenous variables. The association is evident in the presence of a bidirectional arrow connecting three latent exogenous variables: ethical climate and charismatic leadership, charismatic leadership and teachers' sense of self efficacy, ethical climate and teachers' sense of self efficacy.

The single headed arrow directing from the three latent exogenous relates directly to the teacher engagement corresponding to the latent exogenous and endogenous variables measured indicators. This is shown over a single-headed indicator linked after the latent

exogenous variables to the latent endogenous variable. Furthermore, the rectangular form symbolizes the measured domains of the associated latent exogenous and endogenous variables

### Hypothesized Model

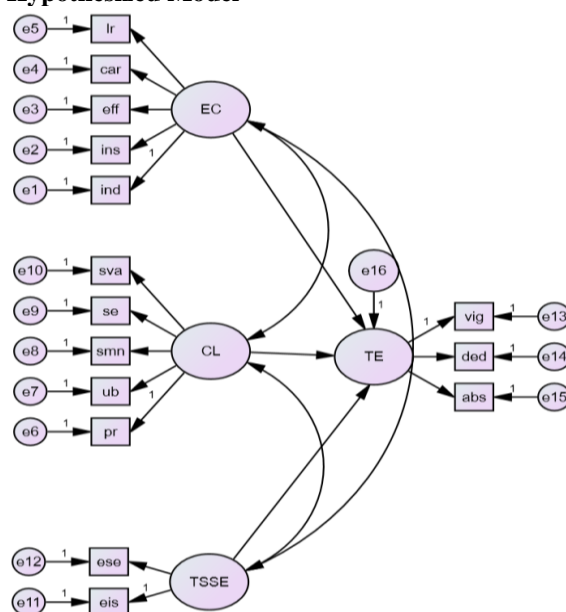


Figure 1. The Interrelationship among Ethical Climate, Charismatic Leadership, and Teachers' Sense of Self-Efficacy and their Direct Causal Relationship towards Teacher Engagement

### Legend:

<i>lr</i> – Laws and Rules	<i>sva</i> – Strategic Vision and Articulation	<i>ese</i> – Efficacy in Student Engagement	<i>vig</i> – Vigor
<i>car</i> – Caring	<i>se</i> – Sensitivity and Environment	<i>eis</i> – Efficacy in Instructional Strategies	<i>ded</i> – Dedication
<i>ind</i> – Independence	<i>smn</i> – Sensitivity to Member Needs	<i>TSSE</i> – Teachers Sense of Self-Efficacy	<i>abs</i> – Absorption
<i>ins</i> – Instrumental	<i>pr</i> – Personal Risk	<i>TE</i> – Teacher Engagement	
<i>eff</i> – Efficiency	<i>ub</i> – Unconventional Behavior		
<i>EC</i> – Ethical Climate	<i>CL</i> – Charismatic Leadership		

Also, the lack of research on the research gap as mentioned above and investigations in terms of teacher engagement in public elementary schools stirred the interest of the researcher to conduct the study that examines the ethical climate, charismatic leadership and teachers' sense of self-efficacy and determined the variable that best predicts teacher engagement especially the model that fits the study. This study showed how the exogenous variables, namely ethical climate, charismatic leadership and teachers' sense of self-efficacy are linked to teacher engagement with models tested using structural equation modelling. Like other employees, teachers must be completely competent because they play a significant part in the educational scheme and their input helps to create an education more relevant to requirements and ambitions.

Consequently, the main thrust of this study was to determine the best fit model of teacher engagement as estimated by ethical climate, charismatic leadership, and teachers' sense of self-efficacy among public elementary schools in Region XI, Philippines. Moreover, this study aimed to describe the level of ethical climate in terms of law and rules, caring, independence, instrumental, and efficiency. It also aimed to ascertain the level of charismatic leadership of school heads in terms of strategic vision and articulation, sensitivity to the environment, sensitivity to member needs, personal risk, and unconventional behavior. Further, it aimed to determine the level of teachers' sense of self-efficacy in terms of efficacy in student engagement and efficacy in instructional strategies. Likewise, it determined the level of teacher engagement in terms of vigor, dedication and absorption. Moreover, it also aimed to determine the significance of the relationship between ethical climate and teacher engagement, charismatic leadership of school heads and teacher engagement, and teachers' sense of self-efficacy and teacher engagement. Lastly, it aimed to determine the model which best fits the teacher engagement.

Based on the above objectives, the null hypotheses were tested at 0.05 level of significance, stating that there is no significant relationship between ethical climate and teacher engagement, charismatic leadership of school heads and teacher engagement, and teachers' sense of self-efficacy and teacher engagement, and lastly that there is no model best fits the teacher engagement.

Significantly, understanding teachers' engagement at work across countries has been the target of most studies. Various authors (Deligero & Laguador, 2014; Furst, 2014; Gould, 2016; Robinson, Perryman & Hayday, 2014; Schaufeli & Bakker, 2014; Schweitzer,

2014; Steger, Littman-Ovadia, Miller, Menger & Rothmann, 2013) have explored the importance of the work engagement of teachers. These studies had highlighted that teachers' work engagement is important since it positively affects the school organizations in general. Maintaining positive work engagement of teachers at work results to school productivity, performance, and effectiveness. Teachers' work engagement is an influential concept that the school can utilize to advance many school functions. Thus, a higher level of teachers' work engagement brings school employees to become more productive, vigorous, dedicated, and enthusiastic to perform duties and responsibilities as part of the dynamic educational institution.

Furthermore, the findings of this study may be beneficial to the Department of Education, school heads, teachers and future researchers. The results of the study may give information to the Department of Education officials regarding school ethical climate, charismatic leadership, sense of self-efficacy, and teacher engagement at work which may serve as the basis for the formulation of plans and programs for improving these school aspects. Also, they may formulate programs and interventions to improve school climate, charismatic leadership of school heads and sense of self-efficacy of teachers which could influence work engagement.

Moreover, the result of the study may be beneficial to the school heads since they may acquire sufficient awareness and information about their charismatic leadership behaviors at school. The school heads as charismatic leaders may consider abilities of the teachers they work with and respond to their needs and feelings. School heads may tend to develop confidence in a team that they may see teachers' potential for development and achieve goals without their being present constantly.

Consequently, findings of this study may also help the teachers in such a way that they may be aware of their self-efficacy and engagement at work. Teachers may be able to recognize their own ability to guide their students to success. Teachers who have confidence are more likely to push students, try new methods, or push through difficulty. When teachers are confident in their ability, persistent through challenge, and innovative in their practices, students can really benefit. Further, this study will also be the benchmark for teachers to improve their vigor, dedication, and absorption at work. Likewise, this study would serve as springboard of the future researcher for further studies about the related variables and related studies.

## Methodology

### Respondents

This study was conducted in the Davao Region, also known as Region XI, one of the Philippines' regions located in the southern part of Mindanao. It is bounded on the east and south by the Philippine Sea, on the west by Bukidnon and SOCSARGEN Region, and on the north by CARAGA Region, as shown on the map. Davao Oriental, Davao de Oro, Davao del Norte, Davao del Sur, and Davao Occidental are the five provinces of the Davao Region, each containing three component cities and three other cities: Davao Oriental, Davao de Oro, Davao del Norte, Davao del Sur and Davao Occidental. Mati City, Davao de Oro has no capital city, Tagum City, Digos City, Davao Occidental has no city, Tagum City, Digos City and Davao Occidental has no city, respectively. Davao City, Island Garden City of Samal, and Panabo City are the other three cities. The study's participants were public school teachers from Region XI's eleven divisions. In the areas mentioned above, survey questionnaires were distributed.

The study's respondents were chosen using a scientific method. For this study, 400 public school teachers from various schools in DepEd Region XI were polled to represent the 41,084 active teachers of the region. The number of respondents per division was determined via stratified random sampling. Following the fundamental rule for the number of respondents appropriate for Structural Equation Modeling (Savalei, 2021), which is between 200 and 400, the researcher attempted to work backward by using an appropriate quota sampling, (Smith & Dawber, 2019) at the .05 significance level.

Further, the researchers considered the inclusion and exclusion criteria in the selection of the respondents of the study. The teacher respondents were the regular teachers among public elementary schools in Region XI whose plantilla numbers were in the Department of Education. These teachers were all public elementary school teachers, and were willing to submit themselves and were permitted by their school heads to undergo the survey to be conducted. Those teachers who voluntarily agreed with the informed consent were included in the survey; hence teachers who clearly confessed their denial were excluded from the study. This study excluded those teachers coming from the private schools. Further, the researcher considered teachers who decided to withdraw or back out during the actual administration of the survey questionnaires.

### Instruments

The modified survey questionnaire used in this study was made up of four parts which are based from downloaded questionnaire, ie, ethical climate, charismatic leadership, teachers' sense of self-efficacy and teacher engagement. These questionnaires were modified and subjected for validation by experts. The first draft of the research instrument was submitted to the research adviser for comments, suggestions, and recommendations to improve its presentation with the corrections to be included and integrated. The final copies were submitted to a panel of experts for refinement. The final revision was made by incorporating the corrections, comments and suggestions given by the expert validators before the gathering of data. The consolidated results from the experts obtained an average weighted mean of 4.50 which has a verbal description of excellent.

Further, before the administration of the research instrument, pilot testing was done to selected teachers who were not the respondents

of the study. The survey questionnaire for the pilot test was subjected to the reliability testing to establish using Internal Consistency Method. This was the most appropriate method to use, since the test contains dichotomously scored items

which the examinee either passes or fails in an item. The computed Cronbach Alpha reliability of the instrument was 0.70 for ethical climate questionnaire, 0.70 for charismatic leadership questionnaire, 0.70 for teachers' sense of self-efficacy questionnaire, and 0.70 for teacher engagement questionnaire. The questionnaire for ethical climate was adapted from Shacklock et al. (2011), and had the following indicators: law and rules, caring, independence, instrumental and efficiency.

Further, the questionnaire for charismatic leadership was adapted from Conger and Kanungo (1998). The questionnaire for the charismatic leadership of school heads had the following indicators: strategic vision and articulation, sensitivity to the environment, sensitivity to member needs, personal risk, and unconventional behavior. Also, the questionnaire for teachers' sense of self-efficacy was adapted from Tschannen-Moran and Woolfolk Hoy (2001), and had the following indicators: efficacy in student engagement, and efficacy in instructional strategies.

Moreover, the questionnaire for the teacher engagement was adapted from the Schaufeli et al. (2006). The questionnaire for the teacher engagement has the following indicators: vigor, dedication, and absorption.

In evaluating the mean of ethical climate, charismatic leadership, teachers sense of self efficacy and teacher engagement, the five orderable gradations with their respective range of means and descriptions are the following: 4.20 - 5.00 labelled as very high and interpreted as always manifested, 3.40 – 4.19 described as high and interpreted as oftentimes evident, 2.60 – 3.39 defined as moderate and taken as occasionally evident; 1.80 – 2.59 labelled as low and interpreted as rarely and lastly 1.00 – 1.79, described as very low and defined as never evident among public school teachers equations (Haavelmo, 1943).

The structural model of Christensen, Johnson and Turner (2011) was used to test the hypothesized models and determine the best fit model for the teacher engagement.

In computing the goodness of fit models, the following indices were computed as follows:

INDEX	CRITERION
P-Close	> 0.05
CMIN/DF	0 < value < 2
P-value	> 0.05
GFI	> 0.95
CFI	> 0.95
NFI	> 0.95
TLI	> 0.95
RMSEA	< 0.05

*Legend:*

*CMIN/DF - Chi-Square/Degrees of Freedom*

*NFI - Normed Fit Index*

*TLI - Tucker-Lewis Index*

*CFI - Comparative Fit Index*

*GFI - Goodness of Fit Index*

*RMSEA - Root Means Square of Error Approximation*

*Pclose - P of Close Fit*

*P-value - Probability Level*

## Research Design and Procedure

The first procedure in collecting the data used in the study was securing the consent to administer the study from the University of Mindanao Ethics Review Committee last May 30, 2022. The creation of survey questionnaires in google forms was facilitated from May 28 to November 28, 2022. A request letter signed by the adviser and dean was sent to the DepEd Regional Director. The approved letter was attached to the letters addressed to different Superintendents of the eleven (11) DepEd divisions of Region XI. Then, a timetable was set for the duration of floating and retrieval of questionnaires which was from November 5, 2022 to January 5, 2023.

Specifically, the researcher started to administer on October 1, 2022 in the Division of DepEd Davao Occidental, DepEd Davao del Sur, Digos City, DepEd Davao City, Davao Del Norte, Tagum City, DepEd Davao De Oro, and DepEd Davao Oriental schools simultaneously through sharing the questionnaires link to friends, colleagues and acquaintances of the researcher. Then, the data gathered were tabulated, analyzed, and interpreted accordingly and confidentially.

The quantitative, non-experimental design of research using correlational technique was used in this study. The following statistical tools were used in interpreting the data collated. Mean was used to describe the level of ethical climate, charismatic leadership, teachers' sense of self-efficacy, and teacher engagement in answer to sub-problems 1 to 4. Pearson r was used to determine the significance of the relationship between the teacher engagement and the exogenous variables (ethical climate, charismatic leadership and teachers'

sense of self-efficacy) in answer to sub-problem 5. Lastly, Structural Equation Modelling (SEM) was used to test the hypothesized models and determine the best fit model for teacher engagement among public elementary schools.

In the conduct of this study, especially before the data were gathered, ethical issues and considerations were dealt. The researcher had undergone evaluation conducted by the members of ethics review committee. After several review process, this study was marked as passed and approved by the UM Ethics Review Committee (UMERC). The researcher was granted a certificate of approval with a UMERC Protocol Number 2022-187.

## Results and Discussion

Presented in this section are the data and analysis of findings based on the data collated from the research instruments used in the study to determine the model best fits the teacher engagement among public elementary schools in Region XI, Philippines. Interpretations of results had the following subheadings: the level of ethical climate of teachers; the level of charismatic leadership of school heads; the level of teachers' sense of self-efficacy; the level of teacher engagement; the significance on the relationship between ethical climate and teacher engagement; the significance on the relationship between charismatic leadership of school heads and teacher engagement; the significance on the relationship between teachers' sense of self-efficacy and teacher engagement; and goodness of fit measures of the three structural equation models.

### Level of Ethical Climate of Teachers

The first objective of this study was to determine the level of ethical climate of teachers. The level of ethical climate of teachers among public elementary schools is in terms of law and rules, caring, independence, instrumental, and efficiency. The data on the ethical climate of teachers in public elementary schools is shown in Table 1.

Table 1. *Level of Ethical Climate of Teachers*

<i>Indicator</i>	<i>SD</i>	<i>Mean</i>	<i>Descriptive Equivalent</i>
laws and rules	0.502	4.63	Very High
caring	0.494	4.57	Very High
independence	0.597	4.42	Very High
Instrumental	0.795	4.04	High
efficiency	0.573	4.44	Very High
Overall	0.453	4.42	Very High

With a standard deviation of 0.453, the overall mean for the ethical climate of teachers is 4.42, which is very high. This very high level of ethical climate is due to the high to very high ratings of teachers on law and rules, caring, independence, instrumental, and efficiency. The data essentially means that teachers always act ethically, exhibiting a strong commitment to ethical rules, principles, and values in their professional duties. These teachers prioritize both the school organization's interests and the well-being of all stakeholders, fostering positive workplace relationships. Additionally, a commitment to efficiency is expected from all teachers, collectively contributing to a robust ethical climate within public elementary schools.

This further indicates that ethical integrity exists among the teaching community, which is an important indicator for sustaining an ethical school environment. This aligns with the findings of several studies (Ampoma, 2021; Kiralp & Yalçın, 2017; Özcan et al., 2017; Yilmaz & Ünsar, 2019) which found that teachers have higher ethical values in which they are aware of professional ethical behavior in schools. In fact, teachers perceive the ethical leadership behaviors of school administrators to be important. These studies indicate the importance of promoting and upholding a high level of ethical climate among teachers in schools of personal values and work behaviors including work efficiency. Likewise, members of an ethical school maintain good relationships at all levels.

Among the five indicators of ethical climate of teachers, the laws and rules attained the highest mean score of 4.63 or very high with a standard deviation of 0.502 while instrumental, the lowest, albeit high gained a mean score of 4.04 with a standard deviation of 0.795. The very high level of law and rules ethical climate indicates that teachers demonstrate profound commitment to ethical laws and rules. They continually stress school organizational rules, legal and professional standards, and place a premium on the rule of law and professional ethics. This demonstrates an ethical excellence culture within this domain of ethical climate. This expands the ideas of several authors (Güngör & Özkara, 2017; Osawaru et al., 2017; Wenning, 2020) highlighting the significance of high levels of ethical laws and rules in schools. Teachers consider ethical dimensions and make ethical decisions. In schools, school leaders together with the teachers foster an ethical environment by respecting rules and regulations.

Hence, the study is in line with the ideas of Ishak et al. (2019) which stated that schools with ethical climate set a formal ethical standards or rules at work where leaders and teachers are acting and involving ethically. With ethical climate, school members understand what is expected from them in terms importance of teachers being aware of legalities, safety measures, and ethical standards in their profession.

The high level of instrumental ethical climate suggests that teachers display a high level of alignment in terms of instrumental ethical climate, with an emphasis on advancing the organization's interests. They prioritize work as subpar when it harms the institution, demonstrating their commitment to its success. The presence of norms and encouraging ethical decisions from an egoistic perspective

shows a culture in which choices are made to maximize both personal and organizational advantages; hence, contributing to an instrumental ethical climate among these teachers. This aligns with the study of several authors (Haldorai et al, 2020; Lemmergaard & Lauridsen, 2008; Martin & Cullen, 2006; Newman et al., 2017) that people inside the organization who see an instrumental climate recognize the organization as having the standards and expectations that empower ethical decision-making from an egoistic point of view. Also, this supports the idea of some studies (Ivlampie, 2017; McNett & Søndergaard, 2017) which revealed the complexities of ethical decision-making from an egoistic standpoint, addressing the need for self-awareness and reflection in the process.

### Level of Charismatic Leadership of School Heads

The second objective was to determine the level of charismatic leadership of school heads, which was measured through a survey questionnaire with the following indicators: strategic vision and articulation, sensitivity to environment, sensitivity to member needs, personal risk, and unconventional behavior. Shown in Table 2 are the data on the level of charismatic leadership of school heads.

*Table 2. Level of Charismatic Leadership of School Heads*

<i>Indicator</i>	<i>SD</i>	<i>Mean</i>	<i>Descriptive Equivalent</i>
strategic vision and articulation	0.654	4.47	Very High
sensitivity to environment	0.650	4.40	Very High
sensitivity to member needs	0.670	4.47	Very High
personal risk	0.735	4.28	Very High
unconventional behavior	0.875	4.13	High
Overall	0.609	4.35	Very High

Computations yielded a grand mean of 4.35 or very high with a standard deviation of 0.609, and this indicates that the level of charismatic leadership of school heads is always manifested. This suggests that charismatic leadership in school heads demonstrates an ability to inspire and motivate their teams by a compelling vision, attention to staff needs and a willingness to take calculated risks or utilize unconventional methods. These school leaders exemplify the characteristics of charismatic leaders, establishing a strong sense of shared purpose and connection across the school community while achieving excellent outcomes.

This aligns with the study of several researchers (Fathurrahman, 2017; Gunasekare, 2019; Isnarofik et al., 2021) which highlighted the importance of a school leaders' charisma in managing and motivating teachers and students. Charismatic leadership is characterized by nurturing, visionary, reliable, risk taking, dedication to duty, responsibility, and high-minded. These studies indicated that the school leaders' charismatic leadership are effective in carrying out managerial leadership, carrying out school tasks, interacting with school personnel and mobilizing school organizations.

The domain of charismatic leadership of school heads that yielded the highest mean score are the strategic vision and articulation and sensitivity to member needs with a mean rating of 4.47 or very high with a standard deviation of 0.654 and 0.670, respectively. On the other hand, the lowest indicator, albeit high is the unconventional behavior which got a mean score of 4.13 with standard deviation of 0.875. The very high level of strategic vision and articulation of the school heads indicates that they can inspire and motivate others through engaging goals and effective communication.

They continuously produce innovative ideas for the school organization's future, which are supported by their appealing public speaking abilities. Furthermore, their forward-thinking mindset, entrepreneurial spirit, and great knowledge of environmental potential demonstrate their outstanding leadership in setting a positive direction for their schools. This aligns with the study of several authors (Heystek, 2022; Mollá & Castelló, 2022; Noman, 2023; Solly, 2021) which suggest that strategic vision and articulation are important aspects of school leadership. School principals develop their professional identity through strategic reflection on their positions. School principals actively participate in developing a contextually responsive school vision that aligns with educational guidelines. Hence, they have seen the importance of a strategic education plan that integrates vision, values, and effective team creation to achieve impact and outcomes. Leadership characteristics such as having vision in improving schools is of significance.

Similarly, the very high level of sensitivity to member needs of school heads indicates the ability of school leaders to foster mutual liking and respect, stressing a supportive culture within the organization. These leaders excel in understanding and addressing the needs and emotions of others, expressing genuine concern for their well-being. Their empathic attitude not only positively influences others, but also leads to a harmonious schoolwork atmosphere that values others' needs and feelings. This supports the study of several authors (Akbar et al., 2019; Helmi et al., 2020) providing insights into the sensitivity of school heads to the needs of their members. It was found that educational administrators demonstrated a high sensitivity level towards others specially the learners. These studies highlighted the importance of social sensitivity for school leaders in effectively communicating and achieving the goals of the school.

Moreover, it expands the avowal of several researchers in their studies (Fatr & Rochyani, 2017; Johnston & Young, 2019; Zavala & Valenta, 2018) suggesting that school principals can support the needs of teachers in various ways. The studies highlighted the role of elementary school principals in supporting teachers, especially in terms of their professional growth and capacity. The school principals have the role also addressing the need for supporting diverse students. Hence, school principals can play a crucial role in helping the needs of both teachers and students in achieving school goals

On the other hand, the high level of unconventional behavior of school heads indicates the willingness of school leaders to employ

innovative and non-traditional strategies to attain school educational goals characterizes their high level of unconventional behavior. They continually amaze others within the organization with strikingly distinctive behaviors that challenge the status quo and promote creative and innovative thinking. This propensity for unconventional methods generates a culture of innovation and adaptability, which eventually contributes to the success of the school. This aligns with the findings of several studies (Cline, 2018; Kocasarac et al., 2019; Widodo 2019) suggesting that innovative school principals play a crucial role in promoting innovation in education and improving student achievement. It is ideal for school principals to support and encourage teachers in implementing innovative strategies in the classroom. Hence, innovative school principals are essential for accommodating the dynamic needs of the education system and society. Successful patterns of leadership include implementing innovations and innovative school principals are key drivers of change and improvement in schools.

### Level of Teachers' Sense of Self-Efficacy

The third objective was to determine the level of teachers' sense of self-efficacy which was measured through a survey questionnaire with the following indicators: efficacy in student engagement, and efficacy in instructional strategies. Shown in Table 3 are the data on the level of teachers' sense of self-efficacy.

Table 3. *Level of Teachers' Sense of Self-Efficacy*

<i>Indicators</i>	<i>SD</i>	<i>Mean</i>	<i>Descriptive Level</i>
efficacy in student engagement	0.480	4.54	Very High
efficacy in instructional strategies	0.515	4.54	Very High
Overall	0.464	4.54	Very High

Computations yielded a grand mean of 4.54 or high with a standard deviation of 0.464, and this indicates that the level of teachers' sense of self-efficacy is always manifested. This implies that teachers constantly demonstrate a strong sense of self-efficacy in their capacity to engage students effectively and apply instructional strategies, suggesting a strong belief in their abilities in these vital aspects of teaching. This is in line with the findings of the study of several studies (Kulawska, 2017; Lazarides & Warner, 2020; Toe & Longaretti, 2022) suggesting a high level of teachers' sense of self-efficacy. These teachers with high self-efficacy are more open to new teaching methods, set challenging goals, exhibit better planning and organization and adjust their strategies when faced with difficulties. Also, teachers with high self-efficacy are high-performing teachers who developed confidence. These studies highlighted the importance of promoting and supporting a very high level of teachers' sense of self-efficacy for positive outcomes in the teaching context.

In addition, the result of this study confirms the study of Quines and Pablo (2023) that the teachers have maintained a high level of confidence that they are able to perform their duties and responsibilities and contribute to the school and the students' academic success. Further, it aligns with the claims of various authors (Barni et al., 2019; Perera & Jayawardana, 2022) that teachers with higher levels of openness to experience and conscientiousness reported a stronger sense of efficacy. Hence, understanding self-efficacy may have important payoffs in working for teachers' well-being and school effectiveness and improvement. Further, teachers who have a high level of self-efficacy produce better results regarding students' academic achievements.

Moreover, data shows that the indicator efficacy in student engagement yielded a mean score of 4.54 or very high with standard deviation of 0.480. This indicates how teachers can connect with problematic students, inspire critical thinking, motivate disinterested learners, build confidence, cultivate a love of learning, foster creativity and assist challenged students in comprehending complex subject concepts. Teachers also excel in working with families to enhance the academic achievement of their children, demonstrating a commitment to improving the overall educational experience. This aligns with various studies (Nelson, 2018; Pedler et al., 2020) highlighting the importance of teachers' efficacy in student engagement. It is important to foster teacher efficacy to strengthen student engagement. Teachers have influence on student engagement and the need clear guidelines and strategies to support engagement consistently.

In addition, it affirms the ideas of some authors (Archambault et al., 2020; Collaço, 2017) stating the contribution of teacher structure, involvement, and autonomy support to student engagement, particularly in low-income elementary schools. Teachers have the role to engage students and suggest effective teaching methods to increase student engagement. Hence, the studies highlighted the crucial role of teachers' efficacy in promoting student engagement.

Further, data shows that the indicator efficacy in instructional strategies yielded a mean score of 4.54 or very high with standard deviation of 0.515. This shows their ability to handle difficult questions, adjust to specific needs of learners, and use a variety of engaging teaching strategies to create effective learning environments. This is in parallel with various studies (Epstein & Willhite, 2015; Lady et al., 2020; Toe & Longaretti, 2022) which suggest that teachers' efficacy in instructional strategies is an important factor in students' educational outcomes. Teachers' efficacy is linked to their instructional management, indicating that teachers with a higher sense of efficacy tend to implement constructive instructional strategies. Likewise, it was stated that teachers demonstrated higher self-efficacy in instructional strategies, suggesting that their training experiences contributed to their confidence as effective teachers.

Further, it confirms the avowal of some authors (Afifah & Ifnuari, 2022; Black & Allen, 2019; Mitchell et al., 2017) which provided insights into effective instructional strategies for teachers in schools. It emphasized the importance of clear expectations, routines,

specific feedback and high rates of opportunities to respond to classroom instruction. These effective teachers can organize classrooms and manage student behavior effectively. Also, teachers can create a fun and engaging learning environment, and utilizing various sources and equipment for effective and quality learning activities. It is important for teachers to place learners' needs at the center of teaching efforts, encouraging questioning, and connecting with students' interests.

### Level of Teacher Engagement

The fourth objective was to determine level of teacher engagement with the following indicators: vigor, dedication, and absorption. Shown in Table 4 are the data on the level of teacher engagement.

Computations yielded a grand mean of 4.50 or very high with a standard deviation of 0.485, and this indicates that teacher engagement is always manifested. The very high level of teacher engagement is due to the very high rating of teachers on vigor, dedication, and absorption.

Table 4. *Level of Teacher Engagement*

<i>Indicator</i>	<i>SD</i>	<i>Mean</i>	<i>Descriptive Equivalent</i>
Vigor	0.556	4.43	Very High
Dedication	0.507	4.67	Very High
Absorption	0.611	4.40	Very High
Overall	0.485	4.50	Very High

This illustrates the teacher's steady enthusiasm and loyalty to their profession, as well as their thorough absorption and immersion in their jobs and responsibilities. This aligns with the findings of Ufaira et al. (2021) that teachers narrated the vigor, dedication, and absorption as the key elements in conduct their work engagement. Also, it confirms the findings of the study of Cainday et al. (2023) that in schools, work engagement of personnel is high. This denotes that they have elevated levels of energy, a deep focus on their work and activities, and are most of all enthusiastic and committed to their work.

From this result, the indicator of teacher engagement that yielded the highest mean score is dedication with a mean score of 4.67 or very high. Further, vigor ranked as the second-highest indicator with a mean score of 4.43 or very high. This is followed by absorption which gained the mean score of 4.40 or very high. The very high level of dedication suggest that teachers' dedication is motivated by their profound sense of purpose, enthusiasm and pride in their challenging and meaningful profession, encouraging steadfast commitment.

This backs up previous research of Roseline & Konya (2019) that found teachers significance, enthusiasm, pride, inspiration and challenge in their work, making it a critical component of engagement behavior within the profession. Furthermore, the findings are consistent with research (Comighud, 2020; Ojales & De Ramos, 2021) that being a teacher entails being dedicated in all endeavors, particularly the intrinsic duty of being committed to and passionate about the teaching profession.

Additionally, the very high level of vigor indicates that teachers' vigor is evident through their strong, energetic, and resilient approach to work, as they consistently feel motivated, mentally resilient, and persevering even in difficult situations, demonstrating a sustained enthusiasm for their profession. This is consistent with the findings of Balbes and Quines (2022) which found a very high level of vigor among teachers in public schools.

Teachers demonstrated a strong command of work engagement in terms of vigor, showing that they put energy, effort, and excitement into their job to achieve their goals and objectives. It also confirms the assertion of various authors (Comighud, 2020; Ojales & De Ramos, 2021) that teachers must be able to demonstrate very high levels of vigor or energy and mental resilience in the delivery of teaching. To demonstrate vigor, they must demonstrate a willingness to spend effort in their work as well as perseverance in the face of academic hurdles and difficulties.

Lastly, the very high level of teachers' absorption reflects their profound immersion in their employment, constant happiness, losing sight of time, and difficulty to disengage from their job. This is consistent with the findings of several studies (Balbes & Quines, 2022; Guhao & Quines, 2021), which said that teachers' absorption implies concentration as well as involvement in their teaching duties. They are gaining work experience, which is rewarding. As a result, teachers are completely immersed in their profession, absorbed by their obligations and their environment in the classroom. They frequently lose sight of time and find it difficult to disconnect from their work.

### Significance on the Relationship between Ethical Climate and Teacher Engagement

One important purpose of this study was to determine whether ethical climate has a significant relationship with teacher engagement. The results of the computations are shown in Table 5. As shown in the table, the overall  $r$ -value on the correlation between the level of ethical climate and the level of teacher engagement was 0.579 with  $p < 0.05$ , which means that ethical climate is significantly associated with teacher engagement. Hence, the null hypothesis is rejected.

Furthermore, when the domains of Ethical Climate such as laws and rules, caring, independence, instrumental and efficacy were correlated to overall teacher engagement, results of the computation yielded the  $r$ -values of 0.475, 0.422, 0.423, 0.393, and 0.524. with

p- value of less than 0.05, respectively which are all significant. These factors are significantly related to the domains of teacher engagement, such as vigor, dedication and absorption. Data implies that when schools maintain an ethical climate in school, teacher engagement rises, highlighting the relevance of ethical values in fostering teacher work engagement. In fact, ethical climate is linked with the vigor, dedication, and absorption domains of teacher engagement. This confirms the proposition of Yener et al. (2012) that work engagement is positively and significantly related with ethical climate. It affirms the idea that ethical climate is correlated with dedication and absorption dimensions.

**Table 5. Significance on the Relationship between Ethical Climate and Teacher Engagement**

Ethical Climate	Teacher Engagement			
	Vigor	dedication	absorption	Overall
laws and rules	.401* (0.000)	.445* (0.000)	.398* (0.000)	.475* (0.000)
caring	.385* (0.000)	.361* (0.000)	.354* (0.000)	.422* (0.000)
independence	.420* (0.000)	.331* (0.000)	.349* (0.000)	.423* (0.000)
instrumental	.372* (0.000)	.216* (0.000)	.417* (0.000)	.393* (0.000)
efficiency	.535* (0.000)	.399* (0.000)	.429* (0.000)	.524* (0.000)
Overall	.550* (0.000)	.441* (0.000)	.512* (0.000)	.579* (0.000)

\*Significant at 0.05 significance level

In addition, the finding supports the proposition of Mitonga-Monga and Cilliers (2015) suggesting employees' perception of workplace ethics climate positively influenced their level of engagement. Also, it is in line with avowal of Ambarwati and Robbie (2021) finding that ethical climate had a significant positive effect on employee engagement.

### Significance on the Relationship between Charismatic Leadership and Teacher Engagement

Another purpose of this study was to determine whether charismatic leadership of school heads has a significant relationship with teacher engagement. The results of the computations are shown in Table 6. As shown in the table, the overall r-value on the correlation between the level of charismatic leadership of school heads and the level of teacher engagement was 0.520 with  $p < 0.05$ , which means that the charismatic leadership of school heads is significantly associated with teacher engagement. Hence, the null hypothesis is rejected.

**Table 6. Significance on the Relationship between Charismatic Leadership and Teacher Engagement**

Charismatic Leadership	Teacher Engagement			
	Vigor	dedication	absorption	Overall
Strategic vision and articulation	.406* (0.000)	.381* (0.000)	.355* (0.000)	.437* (0.000)
Sensitivity to the environment	.427* (0.000)	.380* (0.000)	.431* (0.000)	.477* (0.000)
Sensitivity to member needs	.418* (0.000)	.392* (0.000)	.389* (0.000)	.460* (0.000)
Personal risk	.366* (0.000)	.342* (0.000)	.349* (0.000)	.406* (0.000)
Unconventional behavior	.358* (0.000)	.289* (0.000)	.472* (0.000)	.436* (0.000)
Overall	.462* (0.000)	.415* (0.000)	.473* (0.000)	.520* (0.000)

\*Significant at 0.05 significance level

Moreover, when the domains of Charismatic Leadership such as strategic vision and articulation, sensitivity to the environment and sensitivity to member needs, personal risk and unconventional behavior were correlated to overall teacher engagement, results of the computation yielded the r- values of 0.437, 0.477, 0.460, 0.406, and 0.436 with p- value of less than 0.05, respectively which are all significant. Three factors are significantly related to the domains of teacher engagement, such as vigor, dedication and absorption.

This implies a strong relationship between school leaders' charismatic leadership, which is defined by strategic vision, sensitivity to the environment and member needs, personal risk-taking and unconventional conduct, and teacher engagement at work. When school heads demonstrate these charismatic attributes, they tend to inspire and engage teachers more successfully, stressing the role of charismatic leadership in developing an engaged teaching staff.

This confirms the proposition of previous authors (Shamir et al., 2013; Truffle, 2012) that charismatic leadership has positive relationship with work engagement. Also, it expands the contention revealed in some studies (Babcock-Roberson & Strickland, 2010; Mangundjaya, 2017; Shooraj, 2016; Tufan, 2022) which found that charismatic leadership is linked to employee engagement.

## Significance on the Relationship between Teachers' Sense of Self-Efficacy and Teacher Engagement

This present study also aimed to determine whether teachers' sense of self-efficacy has a significant relationship with teacher engagement. The results of the computations are shown in Table 7.

Table 7. *Significance on the Relationship between Teachers' Sense of Self-Efficacy and Teacher Engagement*

<i>Teachers' Sense of Self-Efficacy</i>	<i>Teacher Engagement</i>			
	<i>Vigor</i>	<i>dedication</i>	<i>absorption</i>	<i>Overall</i>
efficacy in student engagement	.610* (0.000)	.37* (0.000)	.492* (0.000)	.627* (0.000)
efficacy in instructional strategies	.654* (0.000)	.538* (0.000)	.524* (0.000)	.657* (0.000)
Overall	.678* (0.000)	.576* (0.000)	.545* (0.000)	.688* (0.000)

\*Significant at 0.05 significance level

As shown in the table, the overall *r*-value on the correlation between the level of teachers' sense of self-efficacy and the level of teacher engagement is 0.688 with  $p < 0.05$ , which means that the teachers' sense of self-efficacy is significantly associated with teacher engagement. Hence, the null hypothesis is rejected. This implies that when teachers have a strong sense of self-efficacy.

In addition, when the domains of teachers' sense of self-efficacy such as efficacy in student engagement and efficacy in instructional strategies were correlated to overall teacher engagement, results of the computation yielded the *r*-values of 0.627, and 0.657 with *p*-value of less than 0.05, respectively which are as significant. These factors are significantly related to the domains of teacher engagement, such as vigor, dedication and absorption. efficacy in terms of efficacy in student engagement and efficacy in instructional strategies, and positively contribute to higher teacher engagement in terms of vigor, dedication, and absorption within the school. This aligns with the findings of the study of several authors (Fitriasari & Ummah, 2020; Lipscomb et al., 2021; Wang & Dapat, 2023) suggesting that self-efficacy is an important predictor of work engagement among teachers especially those in the basic education levels.

Further, this study confirms the proposition of Garg Sethi & Gupta (2017) which revealed that employees who are highly engaged are also high on the self-efficacy dimension. It can be assumed that there is a positive relationship between self-efficacy and the three dimensions of employee engagement - vigor, dedication, and absorption. The original proposed model outlined in Figure 1 required some modification to fit the data. There were three generated models presented in the study. In identifying the best fit model, all indices included must consistently fall within the acceptable ranges. Chi-square/ degrees of freedom value should be less than 2 but greater than 0 with its corresponding *p*-value greater than 0.05. The root mean square error approximation value must be less than 0.05 and its corresponding *P*-close value must be greater than 0.05. The other indices such as the normed fit index, Tucker-Lewis index, comparative fit index and the goodness of fit index must all be greater than 0.95.

## Conclusion

The results revealed that the descriptive level of the exogenous variables: ethical climate, charismatic leadership of school heads, and teachers' sense of self-efficacy are very high which signifies that these variables are always manifested. Meanwhile, the endogenous variable - teacher engagement, with a very high descriptive level, signifies that the teacher engagement is always manifested.

The significant relationships between ethical climate and teacher engagement, and between charismatic leadership of school heads and teacher engagement as well as between teachers' sense of self-efficacy and teacher engagement imply that any increase in ethical climate, charismatic leadership of school heads, and teachers' sense of self-efficacy results in a corresponding increase in teacher engagement.

The structural model indicates the best fit model for the teacher engagement as proven by the summary of the goodness of fit satisfying all the indices for a structural equation model.

The significant direct effect of ethical climate, charismatic leadership of school heads, and teachers' sense of self-efficacy on teacher engagement implies that the teacher engagement is influenced by ethical climate and charismatic leadership of school heads accompanied with teachers' sense of self-efficacy.

Finally, findings showed that Model 3 came out as the best-fit model on teacher engagement. Further, the best fit model was model 3 showed the direct causal relationships of ethical climate, charismatic leadership of school heads and teacher's sense of self efficacy on teacher engagement. Furthermore, structure modifications revealed that teacher engagement was defined by its retained indicators; vigor, and absorption. On the other hand, ethical climate was described by its domains: laws and rules, efficiency and independence. Charismatic leadership was determined by its retained indicators; strategic vision and articulation, sensitivity to member needs and personal risk. Finally, Teachers' sense of self-efficacy was measured by its domains: efficacy in student engagement and efficacy in instructional strategies. This implies that schools may focus on improving teacher engagement by setting school ethical norms and expectations with improved teachers' efficacy coupled with enhanced charismatic leadership behavior of school heads.

It was revealed that the following indicators got the lowest means: instrumental for ethical climate; unconventional behavior for charismatic leadership; and absorption for teacher engagement. Hence, the Department of Education may take proactive steps to investing in comprehensive training and professional development programs that emphasize the importance of fostering an ethical climate. Additionally, leadership development initiatives may focus on promoting charismatic leadership, especially in terms of improving innovative practices of school heads. Furthermore, DepEd may encourage schools to prioritize teacher engagement, particularly in terms of absorption, through mentorship programs and supportive work environments. Further, DepEd may establish monitoring and accountability mechanisms to ensure these recommendations are effectively implemented and sustained.

Further, it was found that the best fitting model shows that the ethical climate, charismatic leadership of school heads, and teachers' sense of self-efficacy have significant direct effect on teacher engagement. Hence, it is recommended that the schools may collaboratively establish and maintain an ethical climate by reinforcing clear ethical guidelines, offer charismatic leadership training for school heads to inspire and motivate teachers, and cultivate teachers' sense of self-efficacy through ongoing professional development and mentorship programs. Encouraging collaboration among teachers, fostering a supportive work environment, regularly assessing teacher engagement, providing professional growth opportunities and recognizing excellence are vital components of a comprehensive approach. By prioritizing these strategies, schools can create a positive and empowering atmosphere that boosts teacher engagement, leading to improved educational outcomes for students and a more fulfilling teaching experience for educators.

Moreover, future researchers in this field may focus on conducting comprehensive studies across diverse educational settings and populations to better understand the intricate connections between ethical climate, charismatic leadership of school heads, teachers' sense of self-efficacy and teacher engagement. Employing mixed-methods research, they can delve into the nuanced experiences of educators, considering both quantitative data for statistical analysis and qualitative insights for a richer context. Likewise, researchers may develop and assess intervention programs aimed at improving these factors and examine potential mediators and moderators. By offering practical recommendations and emphasizing ethical considerations, future research can guide educational policymakers and practitioners in fostering more engaging school environments.

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