

## Teacher Leadership Development in Elementary Schools in South Minahasa Regency

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### ABSTRACT

The development of teachers' roles extends beyond teaching to leadership roles. This study aims to describe and identify teacher leadership development, its determinants, and its outcomes in elementary school settings. This study employed a case study method with a multi-case study design. The primary data source was an informal group of 11 participants, consisting of three principals and eight teachers. Data collected through interviews, observations, and documentation studies were processed using qualitative data analysis techniques using an interaction model. The validity of the research data was tested using credibility, transferability, dependability, and confirmability techniques. The results of the study are presented in three findings. First, elementary school teacher leadership development occurs through teacher learning, the boundaries of teacher leadership encompassing the classroom, group, and organization, and roles within and outside the school. Second, the determinants of elementary school teacher leadership development include internal and external factors, as well as interactions between principals and teachers. Third, the results of elementary school teacher leadership development include outcomes at the teacher, student, and school levels. The results of this study are discussed in relation to theory and empirical evidence from previous research. Furthermore, the research conclusions and recommendations are described.

**Keywords:** determining factors, development outcomes, leadership, teachers.

## INTRODUCTION

Student learning outcomes in elementary schools (SD) are determined by factors both internal and external to the students. One external factor that contributes to the high and low levels of student learning outcomes is the teacher as a professional educator. Therefore, professional teacher development, pursued independently by teachers and fostered by principals and school supervisors, is crucial. The existence of teachers in elementary schools as professional educators, in addition to carrying out primary duties, additional duties and other additional tasks, as well as implementing workloads (Kemdikbudristek, 2024). The main duties of teachers in elementary schools include educating, teaching, guiding, directing, training, assessing, and evaluating students. Additional duties inherent in the implementation of primary duties are in accordance with the teacher's workload, such as the principal who is tasked with leading learning and managing the school, the vice principal, and special guidance counselors in schools that provide inclusive or integrated education. Other additional duties of elementary school teachers include homeroom teachers, supervisors of the Intra-School Student Organization (OSIS), extracurricular activities supervisors, coordinators of Continuing Professional Development (PKB), on-duty teachers, members of the teacher performance management team, administrators of professional teacher organizations, tutors, and coordinators of projects strengthening the Pancasila student profile.

Elementary school teachers' workload includes planning lessons, which includes reviewing the curriculum and developing lesson plans in accordance with process standards; implementing lessons, which is the implementation of the lesson plan; assessing learning outcomes, which is the process of collecting and processing information to measure student learning outcomes in aspects of attitudes, knowledge, and skills; and guiding and training students through co-curricular and/or extracurricular activities. Elementary school teachers assigned additional duties by the principal fully fulfill their workload, which includes management, entrepreneurship development, and supervision of teachers and education staff. Meanwhile, teachers in elementary schools who are appointed to the position of school supervisor carry out a workload that includes carrying out supervision, guidance and professional training tasks for teachers equivalent to implementing learning and planning, evaluating and reporting the results of implementing coaching, monitoring, assessment and guidance for teachers and school principals in their supervised schools.

In addition to carrying out primary duties, additional duties, other additional duties, and fulfilling workloads, the presence of teachers in schools that researchers obtained during preliminary studies in December 2023 and January 2024, it appears that teachers at SDN 2 in Amurang District with conditions located near the district center and in the district center, have state status, and are driving schools during the implementation of the independent learning policy; St. Paul Catholic Elementary School in Tompasobaru District is located in the district center and has private status managed by the diocesan foundation of the Catholic Church; and GMIM Makaanuyen Elementary School in Modinding District which is located on the outskirts of the district center, has private status managed by the Christian education foundation of the GMIM Church in South Minahasa Regency also carries out leadership roles within the school environment as chairpersons of the Teacher Working Group (KKG) and outside of school such as chairpersons in community and government activities in the village/sub-district and church activities. Examining the background and context of teacher leadership in the schools in question, it still tends to be oriented toward "simply being a leader" and has not yet

developed a new orientation on how elementary school teachers "develop into leaders." Although elementary school teachers have carried out their primary duties, additional duties, additional tasks, and other responsibilities within the community, the results of the preliminary study conducted by the researcher indicate a problematic situation in which not all of these tasks are being implemented optimally. This occurs because, in addition to indicating that the leadership competencies acquired by elementary school teachers during their previous university education tend not to be effectively implemented, it also indicates that elementary school teachers tend not to engage in ongoing professional development in leadership after securing formal employment as elementary school teachers.

Based on this problematic situation, the researcher sought to examine the root causes in depth through unstructured interviews with several teachers and principals. The results of the study identified one root cause of this problematic situation: suboptimal teacher leadership development in elementary schools, resulting in teachers being unable to fully fulfill their roles as leaders. Based on the preliminary study conducted by the researcher, two research issues related to teacher leadership development in elementary schools have been identified, which have been neglected in the context of South Minahasa Regency. First, there is a tendency for principals to be less concerned with assigning or facilitating elementary school teacher leadership development. Reasons include insufficient time allocated and the phenomenon of feeling threatened or out-competed if teachers are later promoted to hold additional duties as principals. Second, there is a lack of intensity in individual, collective, and collaborative learning initiatives by elementary school teachers in developing leadership when starting and during their teaching assignments. Based on these problem indications, the researcher deems it important to conduct research on elementary school teacher leadership development.

There are six fundamental reasons why research on teacher leadership development in elementary schools is important. First, research on teacher leadership is still rare in the Indonesian context, especially in elementary schools and the context of South Minahasa Regency, North Sulawesi Province, Indonesia. This is supported by a systematic literature review by Schott, van Roekel & Tummers (2020), published from January 2014 to December 2018, which found that most teacher leadership research was conducted in the United States, indicating that the American perspective is leading in studying teacher leadership, and has been conducted in Asian countries such as China, Taiwan, and Malaysia. Furthermore, Schott, van Roekel & Tummers' (2020) study found that only three studies used a cross-national comparative design, none of which were in Indonesia. Second, research on teacher leadership development, reviewed from a definitional perspective, shows that there is no single consensus among researchers. This indicates that, in the context of the process of becoming, the concept of teacher leadership remains open to anyone who formulates a definition of teacher leadership. Most researchers define teacher leadership as a process in which teachers, individually and collectively, influence colleagues, principals, and other members of the school community to improve teaching and learning practices with the goal of improving student learning and achievement. Schott, van Roekel, and Tummers (2020) recommend that academics rely on this definition because it not only emphasizes that teacher leadership is a process of influencing others but also encompasses other important elements of teacher leadership, such as independence from formal positions and student development as a goal of teacher leadership. Therefore, it is increasingly important to research how elementary school teacher leadership is developed/formed. Third, research on teacher leadership development, reviewed from the research design used, is ordered as follows: 1) most researchers use

qualitative research designs dominated by the use of interview methods; 2) followed by quantitative research designs dominated by the use of survey methods; and 3) finally followed by the use of mixed qualitative and quantitative methods in researching teacher leadership. Although this study uses a qualitative research design with interview data collection techniques, in its implementation it uses the Forum Group Discussion (FGD) technique to further ensure the internal validity (credibility) of this study. Fourth, research on teacher leadership development, reviewed from the antecedents of teacher leadership, has been identified at three levels. These three levels are: 1) teacher-based antecedents, including teachers themselves through skills, preparation, and personality that contribute to teacher leadership development; 2) school-level antecedents, including principals through identifying teacher leaders and providing support, teacher colleagues through role models, and organizational contexts through supportive environments; and 3) above-school antecedents, including educators/teachers through training, the government through certification and inspection, and networks through peer lobbying. Lengkong's (2024) research shows that teacher leadership development is influenced by six main factors, namely specific personal factors, principal leadership, school culture, school climate, relationships, and structure. Therefore, it is important to examine the determinants of elementary school teacher leadership development. Fifth, research on teacher leadership development, reviewed from the results (outcomes), can be divided into four things, namely: 1) teacher outcomes include job satisfaction and successful problem-solving strategies; 2) school-level outcomes include curriculum development and learning improvements; 3) outcomes above the school level include parent-teacher engagement, teacher networks, participation in professional learning communities, and policy influence; and 4) student outcomes include active student engagement in learning and student achievement as measured by learning outcomes as formulated in graduate competency standards. Therefore, it is important to examine the outcomes of elementary school teacher leadership development. Sixth, research on teacher leadership development can contribute to efforts to develop the body of knowledge on educational leadership in general and school leadership in particular. In addition, this research can contribute to the formulation of teacher leadership development policies carried out through ongoing professional development, whether facilitated or assigned by the principal or initiated by teachers as part of teacher self-development for career preparation and promotion when given the opportunity to carry out additional tasks and other additional tasks that require teacher leadership competencies.

From a theoretical perspective, previous research on teacher leadership development has utilized the principal-teacher interaction paradigm, the theory of action for teacher leadership, the role of teacher learning as a mediator of teacher leadership development, and multi-level teacher leadership (Aliu, Kaçaniku & Saqipi, 2024; Alnasser, 2023; Lovett, 2023; Schott, van Roekel & Tummers, 2020). These paradigms, previously used in teacher leadership research, have made significant contributions to constructing the concept of teacher leadership. However, this study focuses on constructing elementary school teacher leadership development. Little is known about how teacher leadership develops and its impact. This is important because Žydzīūnaitė (2025) emphasized that teacher leadership is a constantly evolving phenomenon that requires unique descriptions in both international and local contexts to spark teachers' creativity and courage to innovate. Therefore, this study seeks to examine how elementary school teacher leadership develops and its outcomes. In essence, elementary school teacher leadership development does not emerge spontaneously, but rather emerges naturally as a result of an interaction of influences. The nature of this interaction of influences is explained

through three elements: 1) teacher leadership development, 2) determinants of teacher leadership development, and 3) outcomes of elementary school teacher leadership development. The construct of the nature of influence is adapted from the multi-level teacher leadership paradigm (Schott, van Roekel & Tummers, 2020).

Comprehensive research on elementary school teacher leadership is extensive, complex, and multidimensional. Considering the limitations of time, energy, and research costs, the researcher focused this study on the leadership development of elementary school teachers with a minimum of 10 years of service as civil servants (PNS/ASN) at SDN 2 Amurang, located near the district center, St. Paulus Catholic Elementary School, located in the city center of Tompasobaru District, and GMIM Makaanuyen Elementary School, located in rural Modoinding District, South Minahasa Regency. The purpose of this study is to describe the following: 1) Elementary school teacher leadership development in South Minahasa Regency. 2) Determining factors of elementary school teacher leadership development in South Minahasa Regency. 3) Results of teacher leadership development in South Minahasa Regency.

## METHOD

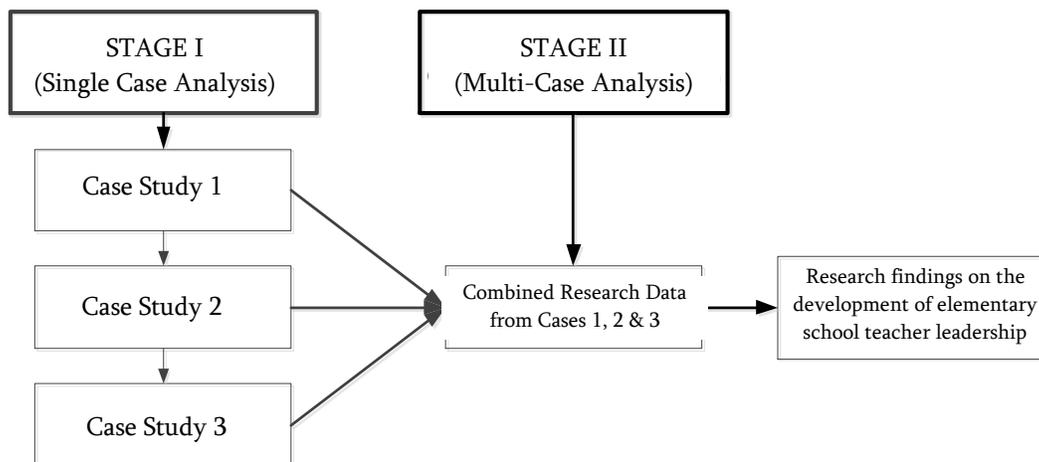
### Types of research

Referring to the research problem formulation and objectives, this research is relevant to using a qualitative approach and a case study method with a multi-case study design (Creswell, 2012; Gay, Mills & Airasian, 2012). The determination of this qualitative approach in this study is based on considerations of the characteristics of qualitative research, including natural settings, researcher as key instrument, multiple sources of data, and emergent design (Creswell, 2014:233-234). This means that research using this qualitative approach is conducted in a natural setting, the researcher acts as the key instrument, includes various data sources, and the design emerges more clearly after conducting research at the research locations: SDN 2 Amurang in Amurang District, St. Paulus Catholic Elementary School in Tompasobaru District, and GMIM Makaanuyen Elementary School in Modoinding District, all located in South Minahasa Regency. Research on elementary school teacher leadership development is not conducted in an experimental setting, as in quantitative research. Instead, it takes place in a natural setting where the researcher collects data through interviews with informants and observes their behavior and actions within their context. The primary instrument is the researcher, who collects data through observation, interviews, and document review. In qualitative research, researchers do not collect data from a single source but rather collect various forms of data, such as interview data, observation data, and documentation. Furthermore, qualitative research design is emergent in nature, as the initial research plan cannot be strictly defined, and some or all phases of the process may change after the researcher enters the field and collects data.

The use of a qualitative approach can be implemented by selecting and establishing a relevant research method. The research method chosen and implemented by the researcher in this study is a case study. The use of this case study method is based on considerations such as the researcher's desire to answer descriptive and explanatory questions, as well as an interest in studying the process (Creswell, 2014). Based on these considerations, the case study method is clearly used because the researcher seeks to answer both descriptive and explanatory research questions: how is teacher leadership developed?

What factors determine teacher leadership development? and what are the results of teacher leadership development? Is it centered on the principal's learning? Creswell (2014:444) explains that case study research is a qualitative research method that focuses on "... a unit of study known as a bounded system". The cases in this study are school organizations, namely SDN 2 Amurang in Amurang District, St. Paulus Tompasobaru Catholic Elementary School in Tompasobaru District, and GMIM Makaaruyen Elementary School in Modinding District, located in South Minahasa Regency. The selected elementary schools were based on rational-scientific considerations of the case study method and the Promoter's recommendations regarding the characteristics of different school settings, namely being located around the Regency city center, being located in the District center, and being located in rural areas. Based on the consideration of the differences in elementary school characteristics, the qualitative approach with the case study research method was deemed relevant and was determined using a multi-case study design.

Referring to the nature of the cases in this study, which are more than one or three cases mapped, the relevant case study design used is a multi-case study. Related to this, Creswell (2014:452) explains that in educational research it is common to "find case study research conducted on a single phenomenon but in multiple locations. Such studies are usually referred to as collective case studies, multi-case studies, multi-site, or comparative case studies." The phenomenon examined in this study is the development of elementary school teacher leadership, and the case in this study is the school organization. Creswell (2014:452) also states that "multi-case studies require cross-site analysis." In this study, it is clear that the multi-case is depicted from three elementary schools and the cross-site is depicted from three school settings or locations. Therefore, it can be stated that this study uses a multi-case study design through two stages of analysis: single-case analysis and cross-case analysis, as shown in Figure 1.



**Figure 1.** Research Design

### 1. Single Case Analysis

In this first stage, researchers conducted research sequentially at each elementary school, starting with SDN 2 Amurang in Amurang District, followed by St. Paulus Catholic Elementary School in Tompasobaru District, and then GMIM Makaaruyen Elementary School in Modinding District. The series of studies in this first stage served as an integral part of the study. The single case analysis

presented includes a general description of the research location, research data, research findings, creating tables containing conceptual points, and formulating research propositions.

## 2. Cross-Site Analysis

Upon completion of the series of studies from case 1 to case 2 to case 3, the researcher proceeded to the second stage, which was cross-site or multi-case analysis. The researcher conducted this stage, following the single case study, continued with cross-site data analysis to obtain similar and different findings related to elementary school teacher leadership development.

The main activities carried out by researchers in this cross-site or multi-case study include analyzing combined research data per research case and constructing it into research findings that are formulated conceptually, creating tables for presenting research findings, and compiling research findings on the development of elementary school teacher leadership.

## Place and Time of Research

This research was conducted at the research locations: SDN 2 Amurang in Amurang District, St. Paulus Catholic Elementary School in Tompasobaru District, and GMIM Makaanuyen Elementary School in Modinding District, all located in South Minahasa Regency. The research period was six months, from February to August 2024. The research timeframe was based on the fundamental nature of qualitative research, namely the implementation of data validity tests, specifically data credibility or internal validity and the principle of data saturation (Sugiyono, 2014; Lengkong, 2004), ensuring efficient and effective use of the planned research time.

Although the research timeframe was utilized efficiently and effectively, the Promoter, after reviewing the research results, considered it necessary to conduct an FGD to member-check informants to assess data credibility. This was conducted on October 31, 2025. The Promoter's recommendations included the need for resource persons and the Promoter as resource persons. Therefore, the research timeframe was extended to include the FGD.

## Data and Data Sources

The research data collected in this study consisted of qualitative data in the form of words, text, and images derived from observations, interviews, and documentation studies (Creswell, 2014). Verbal data represents the social reality of the participants or informants. Their words offer detailed and concrete descriptions of the meanings ascribed to their words. For example, the informants' expressions obtained through interviews. Textual data represents the reality of the contents of printed documents in written form that convey meaning. For example, the text in a document available at school. Meanwhile, image data essentially represents the reality of the appearance and impression contained in visual materials. For example, photos or videos of teacher activities available at school.

The data sources for this study were human informants, namely the principal and teachers with ASN/PNS status at the school with more than ten years of work experience. At SDN 2 Amurang, there were four informants: the principal and three teachers; at SD Katolik St. Paulus Tompasobaru consisted of three informants: the principal and two teachers; and GMIM Makaanuyen Elementary School consisted of four informants: the principal and three teachers. The principal was chosen as the informant because, thus, the total number of informants in this study was 11. The principal was chosen because, in addition to the data triangulation technique in testing data credibility, it was also related to

the main research problems and data from teacher informants as teacher leaders who require data confirmation from the principal to support teacher leadership development practices.

In addition, research data can also come from non-human sources, namely written documents and images in the form of photographs of activities related to elementary school teacher leadership development.

### **Data collection technique**

Data collection techniques commonly used in qualitative research are interviews, observation, and document studies. The use of these data collection techniques in this study is explained as follows.

#### *1. Interviews*

Before conducting the interviews, the researcher prepared a field notebook to record the interviewees' findings. Interviews with informants were conducted face-to-face and unstructured, using open-ended questions related to health service management.

#### *2. Observation*

The researcher's role in the observation process was to conduct non-participatory observations (Creswell, 2014:240). Before conducting the observations, the researcher prepared a field notebook to record the observations in cases 1, 2, and 3. The observation procedure followed the stages recommended by Spradly (Sugiyono, 2007:315), namely: "(1) descriptive stage, (2) focused stage, and (3) selected stage." The application of these observation stages is explained in this study as follows.

In the description stage, the researcher conducts a general and comprehensive exploration, describing everything seen, heard, and felt related to the research problem during field observations. Focused observation is the second stage. In this second stage, the researcher begins to narrow or sharpen the focus on aspects of the research problem through taxonomic analysis or categorization, thus obtaining a clearer picture of teacher leadership development. Finally, the selection stage. At this stage, the researcher identifies characteristics, differences, and similarities between categories and identifies relationships between categories related to teacher leadership development. In this selection stage, the researcher also develops a more detailed and in-depth understanding or hypothesis about teacher leadership development as a research finding.

#### *3. Document Study*

In addition to using interview and observation techniques, the researcher also collects research data through document study, both public and private documents (Creswell, 2014). Public documents include official letters, meeting minutes, and official reports such as school programs. Data collection from private documents requires the consent of the relevant parties. The personal documents in question include personal work-related journals, work-related diaries, official personal letters, and official e-mails. The researchers attempted to collect data from these documents only on matters related to teacher leadership development.

#### *4. Focus Group Discussion (FGD)*

The researcher conducted research data collection through Focus Group Discussions (FGDs) to enrich and ensure the meaningfulness of the data collected through observation, interviews, and documentation. Based on the Promoter's considerations after reviewing the research results, an FGD was deemed necessary, and it was held on October 31, 2025. Recommendations were made in a recommendatory manner. The Promoter required a resource person, and the researcher appointed the Promoter as the resource person for the FGD. However, due to the Promoter's inability to attend, the

researcher was assigned to lead the FGD. Prior to attending and leading the FGD, the researcher was first provided with direct (offline) and online guidance via WhatsApp by the Promoter. The researcher is advised to send an invitation (attached) and a copy to the Study Program Coordinator. The researcher was provided with the main points of the research data that needed to be member-checked during the FGD as part of a data credibility testing technique. The FGD results were discussed with the Promoter, and the consultation results are included in the research results section.

The FGD was conducted at SDN 2 Amurang, involving the principals and teachers. Participants participated in the discussion, which lasted for 1 hour and 15 minutes. Before starting, the researcher gave them the opportunity to ask questions. After that, the researcher posed three pre-written main questions. The researcher also used verbal and nonverbal cues and follow-up questions to encourage participants to provide further information. The researcher recorded the discussion via her mobile phone and recorded it in a detailed field notebook during the discussion to be written in this dissertation research report as recommended by the Promoter. Furthermore, it should be noted that before collecting data at the research location through interviews, observations, documentation studies, and FGDs, and for the purposes of the research data analysis stage, the researcher first coded the informants and the types of data collection techniques. Coding for research informants included the principal (code: KS) and class teachers (code: G). Coding for data collection techniques included interviews (code: Ww), observations (code: Obs), and document studies (code: SDok). Meanwhile, the coding of the main research problems includes teacher leadership development (code: PKG), determining factors of teacher leadership development (code: FPPKG), and the results of teacher leadership development (code: HPPKG). This coding was carried out by the researcher to make it easier for the researcher to organize the data according to the main research problems.

### **Data Analysis Techniques**

The data analysis technique used by the researcher in this study is adapted from the interaction model developed by Miles and Huberman (Sugiyono, 2014). Qualitative data analysis is conducted interactively. Qualitative data analysis begins with data collection, then proceeds to data reduction and presentation. There is a mutual interaction between data reduction, data presentation, and conclusion drawing. Each conclusion/verification process indicates that the data collected through interviews, observations, documentation, and audio-visual materials from various data sources has reached saturation. Therefore, after drawing conclusions, the researcher returns to data collection.

Data reduction in this study involves summarizing, selecting, focusing, and identifying findings and patterns abstracted from field notes obtained during data collection. The results of this data reduction are presented in the form of brief descriptions, tables, charts, relationships between categories, flowcharts, or similar. Conclusions can also be drawn directly from these data reductions without further verification and compiled as research findings. The adaptive application in this study involves analyzing the data recorded in the field notes to obtain findings related to the main research problem. For example, the first main problem is how is elementary school teacher leadership developed at GMIM Makaanuyen Elementary School? Based on an analysis of existing field notes, the researcher found that "teacher leadership development is through teacher learning."

Data presentation (data display) in this study was carried out by compiling information obtained from data collection or data reduction results in the form of brief descriptions, tables, charts, relationships between categories, flowcharts, or similar. The results of this data presentation can also

be directly used for conclusions/verification. If the data presented is unclear, it can be further reduced to ensure clarity and then conclusions drawn without further verification, then compiled as research findings. The adaptive application in this study is that the researcher analyzes the data contained in the field notes to obtain findings related to the main research problem. For example, interview data on elementary school teacher leadership development from field notes is presented in the form of brief descriptions, as seen in the research data presentation.

Conclusion drawing or verification in this study is derived from the results of data reduction or data presentation. These conclusions/verification can be tentative or can already be formulated as research findings. If the conclusions drawn are still provisional or still require verification, they need to be reduced or restated, and then conclusions can be drawn without further verification and compiled as research findings. The adaptive application in this study is that the researcher studies the data recorded in the field notes to formulate provisional conclusions as research findings related to the main research problem. For example, initially the researcher had tentatively concluded that the determining factors for teacher leadership development were factors originating from within the teacher (internal) and factors originating from outside the teacher (external). However, during the FGD, additional data was obtained in the form of interaction factors between the principal and teachers. Therefore, the provisional conclusions were verified into conclusions without further verification and became the findings of this study.

### **Data Validity Testing**

Data validity testing is a strategy to strengthen trust in qualitative research data. According to Sugiyono (2014:267), data validity testing in qualitative research is based on the criteria of "credibility, transferability, dependability, and confirmability." The four criteria for data validity testing are explained as follows.

#### *1. Credibility*

Data credibility testing will utilize triangulation of data sources and triangulation of data collection techniques. Triangulation of data sources is conducted by comparing data collected from three different sources and ensuring that the data obtained is consistent across the three research informants. These data sources can include three identical informants, such as three teachers, or three different informants, such as the principal, a teacher, and a student. Data on elementary school teacher leadership development collected from at least three different sources is considered to meet the credibility criteria.

Triangulation of data collection techniques is conducted by comparing data collected from three different data collection techniques and ensuring that the data obtained is consistent across the three research data collection techniques. These data collection techniques can include a combination of interviews, observations, and documents, or interviews and documents. The data on elementary school teacher leadership development collected from three different data collection techniques were deemed to meet credibility criteria.

The adaptive approach used in this study was to test data credibility through triangulation of data sources and data collection techniques. Data source triangulation included the principal and at least two teachers, although in reality, more than three data sources were used. Triangulation of data collection techniques involved researchers comparing (differences and similarities) data collected from interviews, observations, and documentation studies. In addition, member checking through focus

group discussions (FGDs) was used to test data credibility. This ensured the validity of the data, as in quantitative research, through internal validity.

### *2. Transferability*

The following criterion for testing data validity is transferability. This method involves analyzing the research findings on elementary school teacher leadership development in as much detail and as carefully as possible. By analyzing this research in such detail and as carefully as possible, readers can gain a better understanding of the research findings, which can potentially be transferred to similar contexts elsewhere. The adaptive application in this study is that the researcher describes the research findings in detail and carefully in the form of a dissertation research report. The transferability test is a study with fellow lecturers at FIPP such as Dr. Rommy Mongdong, M.Pd and Dr. Hetty Tumurang, M.Pd regarding the opportunity to transfer to other school contexts such as elementary schools in Tomohon City. There is one thing they agree on from this research finding: "the development of elementary school teacher leadership through teacher learning can be transferred to other elementary schools in Tomohon." Thus, this research is guaranteed from the aspect of application in the form of transferability to other contexts as in quantitative research in the form of internal validity.

### *3. Dependability*

One of the key issues in qualitative research is the research process. To ensure the validity of this qualitative research process, it is necessary to apply dependability criteria to assess its quality. Therefore, the researcher conducted a dependability audit using internal auditors, such as the promoter and two co-promoters, and external auditors, such as examiners/assessors who were not the promoter or co-promoters. By conducting such audits, the researcher can ensure the reliability and trustworthiness of this dissertation research process.

The adaptation in this study involved utilizing the promoter and co-promoters as internal auditors, based on the Supervisor's Decree, and the examiners/assessors as external auditors in the dissertation research results examination to conduct a quality audit of this research process. This audit activity was legitimized by the Decree of the Director of Postgraduate Studies at Unima, thus ensuring consistency in the form of dependability, as in quantitative research, in the form of reliability.

### *4. Confirmability*

Another important aspect in qualitative research is the quality of the research results. Therefore, a new data validity testing criterion, confirmability, was developed as a criterion for assessing the quality of research results by recording data tracking and information, as well as interpretative documentation supported by evidence from the audit trail. Therefore, the necessary materials, such as data, data analysis results, and the research process, were prepared.

In addition, the researcher requested the promoter and co-promoter as internal auditors and the examiners/assessors as external auditors, to assess the quality of this dissertation research. These examiners/assessors, as external auditors, were appointed by the Head of the Doctoral Program in Educational Management and the Director of the Postgraduate Program, in accordance with their respective authorities, as evidenced by a Decree.

The adaptive application in this research was that the researcher utilized the legality based on the Decree of the Director of Pancasarjana Unima to empower the promoter and co-promoter as internal auditors and the examiners/assessors of this dissertation to conduct audits to guarantee and ensure the neutrality of the collected research data, data analysis results, and the dissertation research process, as well as the objectivity of quantitative research.

## RESULTS AND DISCUSSION

### Single Case Study Research Results

#### *Case 1: SDN 2 Amurang*

The results of the single-case study in case 2 are described according to the main research problems as follows.

##### *a) Teacher Leadership Development*

The research data on elementary school teacher leadership development in case 1 can be described based on the results of data analysis. The open-ended question posed by the researcher was: "How is elementary school teacher leadership developed?"

Data from the researcher's interviews with the principal regarding teacher leadership development are presented as follows

*"If you pay attention, I'm not the only one who plays a leadership role at school. My assistant teachers also play a role. Like me, teachers develop leadership through teacher learning that occurs both inside and outside of school. Within school, it's evident in teachers who act as homeroom teachers, KKG (King Group) leaders who also lead their fellow teachers in curriculum and learning matters, and the leaders of the independent community at school. Outside of school, it's evident in teachers who act as leaders within the community and within the church. So, to my knowledge, teacher leadership development within the school is evident in their roles as homeroom teachers who lead student learning, KKG (King Group) leaders and independent community leaders who lead teachers, and the chairperson of the school anniversary committee. Meanwhile, outside of school, it's evident in leadership roles in church matters, such as serving as column elders, chairpersons for church holidays, chairpersons for special minister elections, and in other matters, such as chairpersons of the sub-district election committee (KPPS)." (Ww.PKG-KS).*

Data from interviews with 6th grade teacher informants regarding teacher leadership development are presented as follows.

*"For me, my leadership developed through involvement in learning activities. My leadership development at school included serving as homeroom teacher and KKG (Student Working Group) leader in 6th grade, and as the leader of the independent community at school. Outside of school, I served as a column elder in church affairs. These roles helped develop my leadership as a leader who influences each other both within the school and outside of the school." (Ww.PKG-G.6)*

Data from interviews with grade 5 teacher informants regarding teacher leadership development are presented as follows.

*"My leadership as a teacher didn't just develop overnight. Leadership can be learned in specific contexts. The contexts in which I learned it included being a homeroom teacher, a member of the Community Service Group (KKG), and a church organization. My leadership role was shaped not only by assignments or delegations from the principal, but also by my own initiative, learning from my work environment at school, such as the principal's democratic leadership style, learning from fellow teachers' leadership within the classroom, with additional duties from the principal as homeroom teacher and group leader, such as KKG chair, and community service assignments outside of school as a column elder within the organization. I also realized my role as a leader*

*through learning from the principal's leadership style within the school and through independent learning from the principal, fellow teachers, and leaders within the community and church” (Ww.PKG-G.5)*

Data from interviews with grade 4 teacher informants regarding teacher leadership development are presented as follows.

*”My teacher leadership development occurred through a process of influence with the principal and colleagues or fellow teachers at the school, as well as with community and church leaders. Thus, my teacher leadership development process was carried out through assignments from the principal and requests from community leaders, as well as through self-study as a self-development need that requires the ability to influence others, such as influencing fellow teachers and students in the classroom” (Ww.PKG-G.4).*

*b) Determining factors in teacher leadership development.*

The research data on the determinants of elementary school teacher leadership development in case 1 can be described based on the results of data analysis. The open-ended question posed by the researcher was: What factors determine elementary school teacher leadership development?

Data from interviews with principal informants regarding the determinants of teacher leadership development are presented as follows.

*”In my experience and knowledge, the determining factors for teacher leadership development in schools come from within the teacher themselves (internal) and from factors outside the teacher themselves (external). Internal factors include teacher identification after being given a role in relation to additional assignments as a homeroom teacher that influence other teachers and parents, and the teacher's teaching experience interacting with fellow teachers. Meanwhile, external factors for teachers include my support as the principal leading them, the school culture, and fellow teachers' trust in my leadership. Equally important is the support of parents through the school committee as a partner of the school. In addition, interactions between me as the principal (external factor) and teachers (internal factor) in the form of dialogue and exchange of knowledge or ideas about efforts to improve learning through empowering influence actions from me” (Ww.FPPKG-KS)*

Data from interviews with class 5 teacher informants regarding the determining factors for teacher leadership development are presented as follows.

*”The factors that determine my teacher leadership development are both internal and external. Internal factors include myself. External factors include the principal's support in the form of delegation and assignments, support from the school committee, and a work culture at school that upholds the value of togetherness and collaboration. The principal's interaction with me is influenced by discussions about improving the quality of the learning process and student learning outcomes, both formally in meetings and informally when we meet at school. The quality of interactions is evident in the principal's inspiration and empowerment of teachers, which determines my leadership development as a teacher” (Ww.FPPKG-G.5)*

Data from interviews with class 6 teacher informants regarding the determining factors of teacher leadership development are presented as follows.

*”The principal's inspiring interaction with me determines the development of teacher leadership at school. Teachers naturally assume leadership roles at school. This is because we interact with each*

*other in school activities or when assigned by the principal. For example, when the principal assigns us as homeroom teachers and distributes teaching assignments, there is a mutual influence among the teachers. Therefore, there are factors that originate within me, such as my ability to act as a leader, and factors that originate externally, such as support or facilitation from the principal, the culture established at school, and the trust and support of fellow teachers during interactions at school, both in carrying out teaching duties and other tasks assigned by the principal. As well as the support of the school committee, the community, and the sub-district government outside the school' (Ww.FPPKG-G.6)*

Data from interviews with class 1 teacher informants regarding the determining factors for teacher leadership development are presented as follows.

*"My teacher leadership didn't emerge spontaneously but rather resulted from the interaction of a number of factors. I believe that, whether I realized it or not, I was involved in an interaction of influence with the principal and the teachers. The principal's leadership style, the mutual trust between teachers and the principal, and cultural values such as mutual assistance, collaboration, and deliberation and consensus in decision-making at school were all factors" (Ww.FPPKG-G.1)*

#### *c) Results of teacher leadership development*

The research data on elementary school teacher leadership development in case 1 can be described based on the results of data analysis. The open-ended question posed by the researcher was: What are the results of elementary school teacher leadership development?

The results of interviews with principal informants regarding teacher leadership development are presented as follows.

*"For me, the results or impact of teacher leadership development can be seen from the satisfaction of teachers in playing the role of teacher leaders, improvements in curriculum and learning, as well as student involvement or activeness in learning and student learning outcomes" (Ww.HPKG-KS)*

Data from interviews with 6th grade teacher informants regarding the results of teacher leadership development are presented as follows.

*"The results of my leadership development as a teacher can be divided into the results I obtained, such as feeling satisfied playing the role of a teacher leader, the results of improving the curriculum and learning at school, as well as increasing student activity in the learning process and student learning outcomes" (Ww.HPKG-G.6)*

Data from interviews with grade 5 teacher informants regarding the results of teacher leadership development are presented as follows.

*"In my opinion, the results of teacher leadership development can be demonstrated in three ways. First, at the personal level, namely the satisfaction I feel from my role as a leader. Second, at the school level, namely the improvement in the quality of the implementation of the school's operational curriculum and the improvement in the quality of learning through the use of innovative learning models such as cooperative learning and problem-based learning. Third, at the student level, namely the achievement of learning outcomes supported by student involvement and active participation in the learning process" (Ww.HPKG-G.5)*

Data from interviews with grade 4 teacher informants regarding the results of teacher leadership development are presented as follows.

*"The results of my leadership development during my role as a teacher leader include student learning outcomes, improved quality of learning at school and a sense of satisfaction within myself because the principal gave me the opportunity to carry out a leadership role and received support from teachers and the community" (Ww.HPKG-G.4)*

The researcher further deepened the data from interviews with the research informants through observation and documentation studies. The observational data collected focused on the teacher's activities as homeroom teacher and leadership of the KKG and the Independent Community, which involved interactions between the chairperson and members" (Obs-PKG). The documentation study data obtained by the researcher is limited to photographic evidence of teacher involvement in KKG activities and Independent Community activities" (SDok.PKG).

#### *Case 2: St. Paul Tompasobaru Catholic Elementary School*

The results of the single-case study in case 2 are described according to the main research problems as follows:

##### *a) Teacher Leadership Development*

The research data on elementary school teacher leadership development in case 2 can be described based on the results of data analysis. The open-ended question posed by the researcher was: "How is elementary school teacher leadership developed?"

Data from interviews with principals regarding teacher leadership development are presented as follows.

*"Teacher leadership development is pursued by the teachers themselves through learning activities inside and outside of school. As the principal, I am responsible for fostering their leadership by assigning additional duties as homeroom teachers and MBG leaders at school. Furthermore, teacher leadership development is also carried out through learning outside of school, such as being entrusted with church affairs as a column elder, in village government affairs as the head of the integrated health post (Posyandu) cadre, the head of the neighborhood, and the head of the KPPS (Village Election Committee) in the village, and church affairs as the head of the WKRI (Catholic Women) branch and the head of the St. Paul Parish regional chairman election committee. Thus, teachers learning to play their role as leaders occurs inside and outside of school within the boundaries of the class, groups, and organizations outside of school" (Ww.PKG-KS).*

Data from interviews with class 2 teacher informants regarding teacher leadership development are presented as follows.

*"My teacher leadership development occurs through the process of learning to lead within the school environment and beyond. Within the school environment, I learn to lead teachers and students in my role as homeroom teacher, through delegation of tasks or with the principal's facilitation. Outside the school environment, I learn to lead members of the St. Peter's congregation and learn to lead community members as the neighborhood head in the village" (Ww.PKG-G.2)*

Data from interviews with class 1 teacher informants regarding teacher leadership development are presented as follows.

*"My teacher leadership was formed through learning in the context of tasks distributed by the principal such as leading teachers and students in the role of homeroom teacher and MBG leader at school as well as community service tasks in the village that are known by the principal such as the head of the posyandu cadre in the village and the head of the WKRI (Catholic Women) branch, the*

*head of the St. Paul parish regional head election committee at the Catholic church” (Ww.PKG-G.1)*

*b) Determinants of Teacher Leadership Development*

The research data on the determinants of elementary school teacher leadership development in case 2 can be described based on the results of data analysis. The open-ended question posed by the researcher was: What factors determine elementary school teacher leadership development?

Data from interviews with principal informants regarding the determinants of teacher leadership development are presented as follows.

*”The determinants of teacher leadership development that influence each other through the empowerment of the principal in interaction with me in the teacher leadership process or internal factors (within myself as a teacher) and external factors (outside myself as a teacher). Factors outside the teacher are the principal's personality such as trust in teachers and being trusted by fellow teachers as well as the cultural values of mutual cooperation and collaboration as a reflection of school culture, support from the school committee, government and village community. Factors within the teacher such as trust in the principal and teachers, responsible attitudes and behavior, collaboration with fellow teachers, and motivation to lead others. This means, I can conclude that the factors that determine the development of teacher leadership are external factors, namely from outside the teacher and internal factors, namely from within the teacher” (Ww.FPPKG-KS)*

Data from interviews with class 2 teacher informants regarding the determining factors for teacher leadership development are presented as follows.

*”The first factor determining my leadership development as an elementary school teacher is myself, such as having the motivation to lead and self-confidence. The second factor determining my leadership development as an elementary school teacher is the support and facilitation of my principal and the school culture in the form of cultural values of mutual cooperation and collaboration, the support of the school committee, the attention of the village government and the village community around the school. Basically, these factors interact with each other in many ways, such as the interaction of the inspiring influence of the principal with me when discussing together the issue of the quality of the learning process and student learning outcomes that I submitted to the principal” (Ww.FPPKG-G.2)*

Data from interviews with class 1 teacher informants regarding the determining factors for teacher leadership development are presented as follows.

*”The determining factors for teacher leadership development include the principal's leadership, school factors such as the school culture and climate that enable me to act as a leader, support factors in the form of school committee involvement, opportunities or support from the government and the village community, and my own personal factors of motivation, self-confidence, and my ability to identify myself as a teacher leader at school. These factors interact to shape the quality of teacher leadership development” (Ww.FPPKG-G.1)*

*c) Results of teacher leadership development*

The research data on the results of elementary school teacher leadership development in case 2 can be described based on the results of data analysis. The open-ended question posed by the researcher was: What are the results of elementary school teacher leadership development?

Data from interviews with principal informants regarding the results of teacher leadership development are presented as follows.

*"I believe that the results of teacher leadership development can be described from my perspective, the perspective of the school, and the perspective of the students. The personal perspective of the teacher includes a sense of satisfaction in their role as a teacher leader. The perspective of the school includes improvements and implementation of the school's operational curriculum based on the independent curriculum policy and improvements and implementation of learning, such as differentiated learning. The perspective of the students is reflected in their participation and active participation in the learning process, which impacts learning outcomes" (Ww.HPKG-KS)*

Data from interviews with class 2 teacher informants regarding the results of teacher leadership development are presented as follows.

*"The results of teacher leadership development can be described through the achievement of student learning outcomes in each subject, the implementation of the curriculum and learning based on the independent curriculum, and a sense of pleasure, satisfaction, and benefit for my personal development in terms of leadership roles" (Ww.HPKG-G.2)*

Data from interviews with class 1 teacher informants regarding the results of teacher leadership development are presented as follows.

*"Every development effort inevitably yields results. Likewise, teacher leadership development yields results. In my opinion, the results of teacher leadership development are evident in the improved quality of student learning, such as active participation in class, and improved learning outcomes, such as student achievement in each subject. Other outcomes of teacher leadership development include improved implementation of the 13th curriculum and the Merdeka curriculum, and improved learning quality through the application of differentiated, problem-based, cooperative, and project-based learning models" (Ww.HPKG-G.1)*

The researcher further deepened the data from interviews with the research informants through observation and documentation studies. The observational data obtained focused on the teacher's activities as homeroom teacher and the KKG leadership activities, which involved the interaction between the chairperson and its members" (Obs-PKG). The documentation study data obtained by the researcher is limited to photographic evidence of teacher involvement in KKG activities" (SDok.PKG).

### *Case 3: GMIM Maaaruyen Elementary School*

The results of the single-case study in case 3 are described according to the main research questions as follows.

#### *a) Teacher Leadership Development*

The research data on elementary school teacher leadership development in case 3 can be described based on the results of data analysis. The open-ended question posed by the researcher was: "How is elementary school teacher leadership developed?"

Data from interviews with the principal regarding teacher leadership development are presented as follows.

*"In general, I can say that teacher leadership development is carried out by the teachers themselves and by others, such as myself as the principal, who assist in developing teacher leadership. Parties outside the school also contribute, such as being entrusted with the role of chair of the Student*

*Working Group (KPPS) in the general election. This is part of the implementation of teacher social competence. Equally important, in this school, third- and fourth-grade teachers exercise leadership by serving as chair of the KKG (Community Working Group) in Modoinding District. In my opinion, the core of teacher leadership development is through teacher learning, whether carried out independently by teachers or with assistance or facilitation from assignments from the principal. Teacher leadership roles within the community are a manifestation of the development of teacher social competence” (Ww.PKG-KS).*

Data from interviews with grade 4 teacher informants regarding teacher leadership development are presented as follows.

*”My leadership development has been achieved through learning initiatives I initiated or pursued myself, as well as through efforts from others. These include my own initiatives or efforts as a teacher, including my role as the head of the KKG (Student Working Group) and my involvement in community service, such as serving as the head of the KPPS (Election Working Group) during the election process. Other efforts, particularly the principal’s assignment as a fourth-grade teacher and homeroom teacher, have also been instrumental” (Ww.PKG-G.4)*

Data from interviews with grade 3 teacher informants regarding teacher leadership development are presented as follows.

*”My current leadership as a class teacher and homeroom teacher for grade 3 was developed through a learning process facilitated by the principal and through my own efforts as a reflection of self-development. My leadership development came through learning in carrying out my roles as the KKG (Student Working Group) chair and the KPPS (Student Working Group) chair, where I was able to play a role as a leader for both teachers and the community” (Ww.PKG-G.3)*

Data from interviews with grade 5 teacher informants regarding teacher leadership development are presented as follows.

*”Teacher learning is a crucial pathway in teacher leadership development. This leadership learning is carried out by the teachers themselves and with the support of the principal, other teachers, and the school community. Therefore, teacher learning is a crucial pathway in teacher leadership development, and the learning method is carried out through self-effort and assistance from other parties, namely the principal” (Ww.PKG-G.5)*

#### *b) Determinants of Teacher Leadership Development*

The research data on the determinants of elementary school teacher leadership development in case 3 can be described based on the results of data analysis. The open-ended question posed by the researcher was: What factors determine elementary school teacher leadership development?

Data from interviews with principal informants regarding the determinants of teacher leadership development are presented as follows.

*”My observations of my assistant teachers who carry out teacher leadership development roles are determined by internal and external factors that interact with each other. Through this interaction, teacher leadership development is possible or facilitated. Internal factors include self-confidence, trust in the principal, teachers, and students, self-identification as a leader, motivation to lead teachers and students, and collaboration with teachers. External factors include the principal and fellow teachers who believe they can lead or influence them, the school committee, the village government, and the surrounding community” (Ww.FPPKG-KS)*

Data from interviews with grade 4 teacher informants regarding the determining factors for teacher leadership development are presented as follows.

*"The determining factors for teacher leadership development can be divided into factors from the teacher himself and factors not from the teacher himself. Factors from within the teacher include teacher identification because they are given leadership roles and responsibilities. Factors not from the teacher himself include the principal who leads the school, trust in other teachers in the school, and the school culture created in the school. These factors interact with each other, such as interactions between the principal and me initiated by the teacher and vice versa through the principal's empowerment actions, resulting in discussions and exchanges of knowledge and creative or innovative ideas in order to improve the quality of learning"* (Ww.FPPKG-G.4)

Data from interviews with grade 3 teacher informants regarding the determining factors for teacher leadership development are presented as follows.

*"Improving the quality of learning in every subject is highly dependent on teacher leadership development. However, the level of teacher leadership development depends on several interacting factors, such as principal empowerment. The determining factors for teacher leadership development are trust, school culture, teachers' self-identification as leaders, and the principal's leadership"* (Ww.FPPKG-G.3)

Data from interviews with grade 5 teacher informants regarding the determining factors for teacher leadership development are presented as follows.

*"The development of leadership in our teachers, both inside and outside of school, does not just happen. There are definitely factors that determine it, interacting with each other, between personal and non-personal factors. Personal factors include self-confidence and identifying as a leader. Non-personal factors include the principal's and teachers' trust in their ability to lead, the school's cultural values, such as collaboration and mutual assistance, and working together with the principal and other teachers"* (Ww.FPPKG-G.5)

### *c) Results of teacher leadership development*

The research data on the results of elementary school teacher leadership development in case 3 can be described based on the results of data analysis. The open-ended question posed by the researcher was: What are the results of elementary school teacher leadership development?

Data from interviews with principal informants regarding the results of teacher leadership development are presented as follows.

*"I can group the results of teacher leadership development into three aspects. First, teacher satisfaction as teacher leaders. Second, curriculum and learning improvements in schools. Third, student involvement in the learning process and student learning outcomes"* (Ww.HPKG-KS)

Data from interviews with grade 4 teacher informants regarding the results of teacher leadership development are presented as follows.

*"I can group the results of teacher leadership development into three aspects. First, teacher satisfaction as teacher leaders. Second, curriculum and learning improvements in schools. Third, student involvement in the learning process and student learning outcomes"* (Ww.HPKG-G.4)

Data from interviews with class 3 teacher informants regarding the results of teacher leadership development are presented as follows.

*” The results of teacher leadership development include student learning achievement or attainment, my satisfaction with leadership work, and curriculum and learning development at school” (Ww.HPKG-G.3)*

Data from interviews with grade 5 teacher informants regarding the results of teacher leadership development are presented as follows.

*”Student learning outcomes, my satisfaction as a teacher who is able to lead, motivation to lead, and development of the school's operational curriculum and learning in the school are the results of developing teacher leadership” (Ww.HPKG-G.5)*

The researcher further deepened the data from interviews with the research informants through observation and documentation studies. The observational data obtained focused on the teacher's activities as homeroom teacher and the KKG leadership activities, which involved the interaction between the chairperson and its members” (Obs-PKG). The documentation study data obtained by the researcher is limited to photographic evidence of teacher involvement in KKG activities” (SDok.PKG).

### **Multi-Case Study Results**

Following the analysis of the single case study, a multi-case study was conducted. The researchers began by analyzing the combined research data from Cases 1, 2, and 3 as baseline data. Based on the analysis of the combined research results, research findings revealed differences and similarities between Cases 1, 2, and 3.

Then, to ensure the credibility of the data, the researchers conducted a member check through a Focus Group Discussion (FGD) (Sugiyono, 2007) on the data obtained from informants or data providers in the single case study and the multi-case study. This FGD took place on October 31, 2025, at SDN 2 Amurang (Case 1 in this study) and was attended by the principals and teachers as informants. The FGD confirmed that there were no substantive changes to the processed data. Additional data was added specifically to the second research topic, which focused on the determinants of Elementary School PKG. The data obtained concerns the "principal-teacher interaction factors" that determine or influence the Elementary School PKG. The data obtained regarding these principal-teacher interaction factors are described in the following FGD results.

The principal informant at SDN 2 Amurang revealed:

*” factors that influence teacher leadership development include my interactions with teachers at school... evidence such as me providing coaching or visiting classes where teachers are teaching...” (W-KS.SDN2-FPPKG).*

The informant, the principal of GMIM Makaaruyen Elementary School, revealed  
*”...I agree with the principal of SDN 2 Amurang... the interaction between the principal and teachers at school actually determines the development of teacher leadership” (W-KS.SDGMIM-FPPKG).*

Another informant was a 6th grade teacher at SDN 2 who revealed  
*” My fellow teachers and I communicate with the principal, we interact with each other, converse, discuss improving the school and improving student performance and learning achievement... so, the principal's interaction with me or with other teachers determines our leadership development as teachers...” (W-GK.SDN2-FPPKG).*

Observational data from cases 1, 2, and 3 support the findings from the interviews. Researchers observed at SDN 2

*” The principal is talking about teacher professional development activities” (Obs-SDN2-FPPKG). Researchers observed that in a Catholic elementary school, the principal and the 5th grade teacher discussed in front of the 5th grade about student discipline and the principal's suggestions for handling it, such as finding out the reasons why students were not disciplined” (Obs-SDK-FPPKG).*

The data from triangulated interviews with three informants and the observation data provide evidence that the interaction between the principal and teachers at school is a factor that determines the development of teacher leadership.

## **Research Findings**

### *Elementary School Teacher Leadership Development*

Based on the results of data analysis through single-case studies and multiple-case studies, research findings on the development of elementary school teacher leadership are described as follows.

- a. Elementary school teacher leadership development through teacher learning consists of:
  - 1) Initiated by teacher autonomy
  - 2) Managed by the principal
- b. Elementary school teacher leadership development within the boundaries of teacher leadership, including:
  - 1) Class boundaries
  - 2) Group boundaries
  - 3) Organizational boundaries
- c. Elementary school teacher leadership development in the form of leadership roles inside and outside of school consists of:
  - 1) Roles referred to as homeroom teachers
  - 2) Roles referred to as chairpersons
  - 3) Roles referred to as principals

### *Factors Determining Elementary School Teacher Leadership Development*

Based on the results of data analysis through single-case studies and multiple-case studies, research findings on the determinants of elementary school teacher leadership development are described as follows.

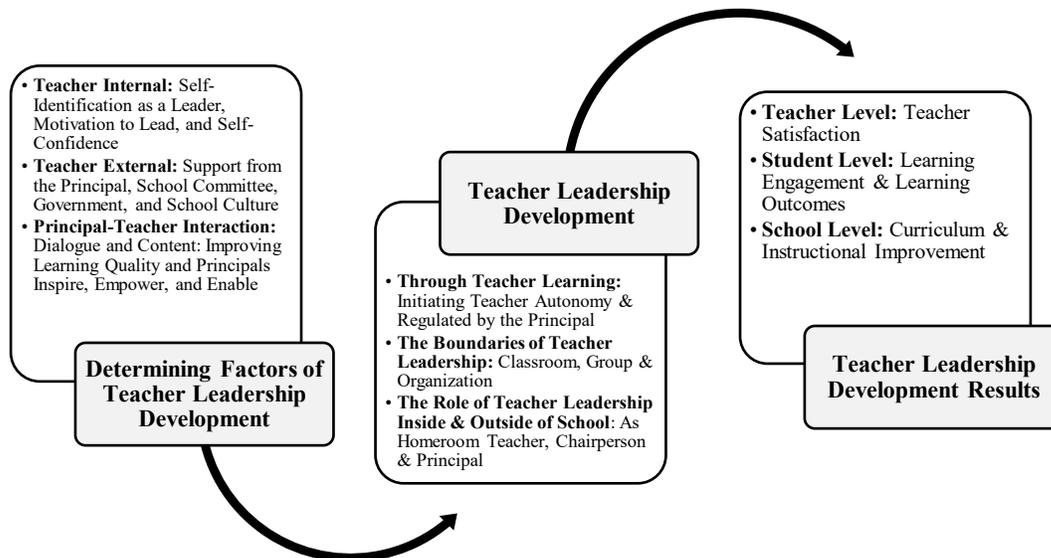
- a. Internal teacher factors include:
  - 1) motivation to lead
  - 2) self-confidence
- b. External teacher factors include:
  - 1) support from the principal in the form of task delegation
  - 2) support from the school committee
  - 3) government support
  - 4) school culture
- c. Factors interacting between the principal and teachers include:
  - 1) through dialogue and the exchange of knowledge and ideas
  - 2) improving the quality of learning as a result of dialogue
  - 3) inspiring, empowering, and enabling as a manifestation of the principal's influence

*Results of Elementary School Teacher Leadership Development*

Based on the results of data analysis through single-case studies and multiple-case studies, research findings on the results of elementary school teacher leadership development are described as follows.

- a. Results of teacher leadership development at the teacher level are:
  - 1) teacher satisfaction with leadership
- b. Results of teacher leadership development at the student level include:
  - 1) student involvement in the learning process
  - 2) student learning outcomes
- c. The results of the Elementary School PKG at the school level are:
  - 1) curriculum and learning improvements

Based on the findings of this study, elementary school teacher leadership development can be constructed. As shown in Figure 2, this can be explained as follows.



**Figure 2.** Development of Elementary School Teacher Leadership

Elementary school teacher leadership development is demonstrated through teacher-initiated learning, driven by teacher autonomy and managed by the principal, within the boundaries of the classroom, group, and organization, and through leadership roles both inside and outside the school as homeroom teachers. The determining factors for elementary school teacher leadership development are divided into three categories. The first theory concerns internal teacher factors, including self-identification as a leader, motivation to lead, and self-confidence. Second, external teacher factors include support from the principal in the form of task delegation, the school committee, the government, the community, and school culture. Third, interaction between the principal and teachers, through dialogue and the exchange of knowledge and ideas, improvement of learning quality as the content of the dialogue, and a principal who inspires, empowers, and enables.

Elementary school teacher leadership development outcomes can be viewed at three levels. First, outcomes at the teacher level include teacher satisfaction with leadership. Second, outcomes at the student level include involvement in the learning process and learning outcomes. Meanwhile, outcomes at the school level include improvements to the curriculum and teaching.

### **Elementary School Teacher Leadership Development**

The findings of this study on elementary school teacher leadership development are demonstrated through teacher learning initiated by teacher autonomy and regulated by the principal; within the boundaries of the classroom, group, and organization, and the forms of leadership roles inside and outside of school as homeroom teachers, chairpersons, and principals. The findings of this study on elementary school teacher leadership development are demonstrated through teacher learning supported by teacher leadership development theory from previous research (York-Barr & Duke, 2004; Szeto & Cheng, 2017; Snoek, 2014) on teacher leadership development theory. Specifically, Szeto & Cheng's research focuses on developing early-career teacher leadership as part of teacher learning, both inside and outside of school. They conducted this research because the teacher learning process has not been explored in relation to principal delegation and teacher recognition of leadership roles within a cultural hierarchical structure. This study used a case study method across the experiences of four early-career Chinese teachers in leadership development in the Hong Kong school system. After five years of observation, teachers' leadership capabilities were reflected in their functional roles, membership, and promotions within the school, as approved by the principal. According to Koty (2020), teacher leadership development through teacher learning can be rationally explained through constructivist learning theory. Dewey is the founder of constructivist theory. Dewey believed that learners must validate knowledge through creativity and collaboration, and that they must be given the opportunity not only to think for themselves but also to express and share their thoughts. Koty also explained that this theory states that students build on prior personal knowledge and experiences to construct new meaning. Continuous cognition and academic growth are seen as integral components of learning. Learning is individualized because each individual learner will have different constructions based on past experiences. Learning is not acquired but is built through an active process. A constructivist learning environment has essential characteristics. Facilitators must provide diverse representations of reality that represent the complex realities of the world and enable students to engage in authentic tasks in real-world or meaningful contexts, or case-based learning (Jennings et al., 2013). Learners must be encouraged to engage in deep reflection on their individual experiences. Knowledge construction must be context- and content-dependent. The learning environment must support collaboration and social negotiation without competition.

Additionally, Koty explains that there are two subsets of constructivist theory. Cognitive constructivism emphasizes that individual learners base their knowledge construction on personal experiences. Two key cognitive constructivists are Bruner and Piaget. Social constructivism expands knowledge construction by incorporating social interactions with others as another way to apply meaning to new information. A prominent social constructivist is Vygotsky, whose zone of proximal development describes what learners can achieve with and without assistance and advocates intersubjectivity, scaffolding, and guided participation. Thus, it can be explained that self-initiated teacher learning is part of self-construction in the context of teacher leadership development, while principal-directed teacher learning is part of construction by others in the context of teacher leadership

development. This is why Lengkong's (2023) perspective on the importance of learning for teachers who undertake additional leadership duties rather than simply discussing student learning is highly relevant.

Research findings on elementary school teacher leadership development are demonstrated within the boundaries of teacher leadership development, which include classroom, group, and organizational boundaries. The findings of this study are supported by Muijs et al. (2013) and Szeto & Cheng (2017) regarding four boundaries: classroom boundaries, where teachers lead other teachers outside their own classrooms; subject boundaries, where teachers lead collaborative work with their colleagues on curriculum and instructional issues; team/group boundaries, where teachers lead the management of issues across years or curriculum groups; and organizational boundaries, where teachers operate outside the school by leading cross-school improvement initiatives. The difference from previous research by Muijs et al. and Szeto & Cheng is that this study did not find any boundaries within subject boundaries.

Meanwhile, the findings of the study on elementary school teacher leadership development related to the forms of leadership roles inside and outside the school as homeroom teachers, chairpersons, and principals are supported by teacher leadership theory and previous research. These types of teacher leadership roles actually describe the role of teachers as leaders in their interactions with the principal, fellow teachers, and students within the school, as well as their interactions with school committee leaders as school partners, government leaders in the sub-district/village, and religious leaders, such as church leaders in this study. In relation to the findings of this study, the results of Szeto & Cheng's (2017) study indicate that the teachers studied played the role of teacher leaders both inside and outside of school. This means that the opportunity for teachers to play these roles actually demonstrates their learning process to improve their leadership quality.

### **Determining Factors in Elementary School Teacher Leadership Development**

Research findings indicate that the determining factors for elementary school teacher leadership development fall into three categories. The first category includes internal teacher factors, namely motivation to lead and self-confidence. Second, external teacher factors include support from the principal in the form of task delegation, the school committee, the government, the community, and school culture. Third, interaction between the principal and teachers occurs through dialogue and the exchange of knowledge and ideas, improving the quality of learning as the content of the dialogue, and a principal who inspires, empowers, and enables.

These research findings support previous research that suggests that teacher leadership development does not occur in isolation but is constantly interacting with other influencing factors. For example, research by York-Barr & Duke (2004) and Lengkong (2024) both identified specific personal factors influencing teacher leadership development. Motivation to lead and self-confidence fall into this category, as does the intrinsic motivation theory, which posits that there are important factors within the teacher that contribute to teacher leadership development. Similarly, teacher self-confidence is a teacher's strong belief in their own abilities, which influences how they approach various situations. Self-confidence involves teachers' belief in their own abilities, optimism, and positive self-management as leaders. This theory emphasizes that self-confidence is formed through interactions with the social environment and personal experiences as leaders for fellow teachers and students.

Similarly, external factors for teachers include support from the principal in the form of task delegation, the school committee, the government, the community, and the school culture. For example, in relation to school culture, York-Barr & Duke (2004) found that school culture can facilitate leadership when it is characterized by a focus on learning, inquiry, and reflective practice, encouragement for initiative, expectations of teamwork and shared responsibility, decision-making, and leadership, professional teachers valued as role models; and a strong sense of community among teachers that fosters professionalism.

The interaction factors between principals and teachers identified in this study are no less important than the internal and external factors of teachers. The interaction between principals and teachers is conducted through dialogue and the exchange of knowledge and ideas, with the content of the dialogue being focused on improving the quality of learning. These research findings align with previous research on principal-teacher interaction and teacher leadership (Szeto & Cheng, 2017) and the multi-level teacher leadership paradigm (Schott, van Roekel & Tummers, 2020).

Dialogic theory is a communication approach that emphasizes two-way conversation, collaboration, and the reciprocal exchange of ideas, rather than a one-way transmission of information. This theory believes that meaning and relationships are built through active interaction, listening, and honest and open responses between the various parties involved. This theory has been applied in various fields, such as public relations, education, and literature, emphasizing the importance of mutual understanding and a willingness to change.

This is particularly relevant to the findings of inspiring, empowering, and enabling principals. Therefore, we next discuss the enabling, inspiring, and empowering effects of the principals' perspectives on teacher leadership development from a diverse range of perspectives.

While this study identified determining factors for elementary school teacher leadership development, it also faced limitations in that it did not explore which factors were supportive and which were inhibiting. Therefore, further research using a quantitative approach is needed to validly and reliably measure the functional level of the contributory factors found in this study through quantitative data rather than qualitative data.

### **Results of Elementary School Teacher Leadership Development**

The results of elementary school teacher leadership development can be viewed at three levels. First, teacher-level outcomes include teacher satisfaction with leadership. Second, student-level outcomes include engagement in the learning process and learning outcomes. Meanwhile, school-level outcomes include curriculum and instructional improvements.

Essentially, the findings of this study align with previous research by Nguyen, Harris, & Ng (2019) on the outcomes of teacher leadership development at the individual teacher, group, school or organization, and student levels. These findings are also supported by the theory of teacher leadership developed from research by Schott, van Roekel, & Tummers (2020). This theory is composed of antecedents, referred to in this study as factors, and outcomes of teacher leadership development at the teacher, student, and school levels.

Antecedents in Schott, van Roekel, and Tummers' teacher leadership theory include teachers themselves, through their skills, preparation, and personality, which contribute to teacher leadership development. School-level antecedents include the principal, through identifying and supporting teacher leaders; teachers' peers, through role models; and the organizational context, through a

supportive environment. Above-school antecedents include educators/teachers, through training; government, through certification and inspection; and networks, through peer lobbying.

Meanwhile, outcomes of teacher leadership development specifically above the school level were not found in this study. In this theory, teacher-level outcomes include job satisfaction and successful problem-solving strategies; student-level outcomes include active student engagement in learning and student achievement as measured by learning outcomes as formulated in graduate competency standards; school-level outcomes include curriculum development and instructional improvement; and above-school outcomes include parent involvement, teacher networks, participation in professional learning communities, and policy influence.

## CONCLUSION

Based on the results of data analysis and research findings, the following conclusions can be drawn from this study. The development of elementary school teacher leadership is demonstrated through teacher learning initiated by teacher autonomy and regulated by the principal; the boundaries of teacher leadership that include classes, groups, and organizations, and the form of teacher leadership roles inside and outside the school. The determining factors for the development of elementary school teacher leadership include the category of internal teacher factors, namely internal teacher factors such as motivation to lead and self-confidence; the category of external teacher factors, namely support from the principal in the form of delegation of tasks, the school committee, the government, the community, and school culture; and the category of interaction factors between the principal and teachers carried out through dialogue and exchange of knowledge and ideas, improvement of learning quality as the content of the dialogue, and the principal who inspires, empowers, and enables. The results of the development of elementary school teacher leadership include teacher-level results, namely teacher satisfaction with leading; student-level results, including involvement in the learning process and learning outcomes; and school-level results, including improvements to the curriculum and learning.

## REFERENCES

- Adams, D., A. Samat, S. N & Abu Samah, H. (2018). Teacher leadership: Going beyond classroom. *International Online Journal of Educational Leadership*, 2(1), 1-3.
- Ali, T. 2014. Development of Teacher Leadership: A Multi-Faceted Approach to Bringing about Improvements in Rural Elementary Schools in Pakistan. *Professional Development in Education*, 40(3), 352-375.
- Aliakbari, M & Sadeghi, A. (2014). Iranian Teachers' Perceptions of Teacher Leadership Practices in Schools. *Educational Management Administration and Leadership*, 42(4), 576-592.
- Aliu, J., Kaçaniku, F & Saqipi, B. (2024). Teacher leadership: A review of literature on the conceptualization and outcomes of teacher leadership. *International Journal of Educational Reform*, 33(4), 388-408. <https://doi.org/10.1177/10567879241268114>

- Alnasser, Y. (2023) Perceptions of Saudi elementary and middle school special education teachers of the concept of teacher leadership, *Journal of Education for Teaching*, 49:1, 153-166, DOI: 10.1080/02607476.2022.2053359
- Angale, P. S. (2017). Organisational influence of teacher leadership: Perspectives from four countries, *International Studies in Educational Administration*, 45(3), 1-4.
- Araşkal, S., & Kılınc, A. Ç. (2019). Investigating the factors affecting teacher leadership: A qualitative study. *Kuram ve Uygulamada Eğitim Yönetimi*, 25(3), ss.419-468 doi: 10.14527/kuey.2019.011
- Blaschke, L. M & Hase, S. (2015). Heutagogy: a holistic framework for creating twenty-first-century self-determined learners. Dalam Gross B., Kinshuk, Maina M., (eds.), *The Future of Ubiquitous Learning. Learning Designs for Emerging Pedagogies*. London: Springer.
- Bouwman, M., Runhaar, P., Wesselink, R & Mulder, M. (2017). Fostering teachers' team learning: An interplay between transformational leadership and participative decision-making? *Teaching and Teacher Education*, 65(July), 71-80.
- Creswell, J. W. (2012). *Educational research: Planning, conducting, and evaluating quantitative and qualitative research*. Saddle River, NJ: Pearson Education, Inc.
- Damayanti, D., Asbari, M & Zaharantika, A. (2024). Guru penggerak: Pengembangan pendidikan melalui kepemimpinan guru, *Journal of Information Systems and Management*, 03(02) 5-10.
- Eachempati P, KS K, K, Komartil R, Ismail, Hj. A. 2017. Heutagogy through Facebook for the Millennial learners. *MedEdPublish*, 1-12.
- Forde, C & Dickson, B. (2017). The place of leadership development for change agency in teacher education curricula for diversity. In Lani Florian and Nataša Pantić, (eds.). *Teacher Education for the Changing Demographics of Schooling: Issues for Research and Practice* (pp. 83 – 99). Cham, Switzerland: Springer.
- Gao, S & Wang, J. (2014). Teaching transformation under centralized curriculum and teacher learning community: Two Chinese chemistry teachers' experiences in developing inquiry-based instruction. *Teaching and Teacher Education*, 44, 1-11.
- Gay, L. R., Mills, G. E & Airasian, P. (2012). *Education research: Competencies for analysis and applications*. Boston: Pearson.
- Grant, C. (2006). Emerging voices on teacher leadership: Some South African views. *Educational Management Administration & Leadership*, 34 (4): 511–532. doi:10.1177/1741143206068215.
- Hallinger, Ph. (2011). Leadership for learning Lessons from 40 years of empirical research. *Journal of Educational Administration*, 49(2) 125-142.
- Harris, A & Muijs, D. (2004). *Improving schools through teacher leadership*. London: Oxford University Press. <https://eric.ed.gov/?id=ED493228>
- Hattie, J. (2015). The applicability of visible learning to higher education. *Scholarship of Teaching and Learning in Psychology*. 1. 79-91. 10.1037/stl0000021.
- Hunzicker, J. (2017). From teacher to teacher leader: A conceptual model. *International Journal of Teacher Leadership*, 8(2), 1-27.
- Hunzicker, J. (Ed.). 2018. *Teacher Leadership in Professional Development School: A Definition, Brief History, and Call for Future Study*. In Jana Hunzicker. *Teacher Leadership in Professional Development School*. United Kingdom. Emerald Publishing Limited.

- Kale, M & Özdelen, E. (2014). The analysis of teacher leadership styles according to teachers' perceptions in primary schools. *Procedia - Social and Behavioral Sciences*. 152. 227 – 232.
- Katzenmeyer, M & Moller, G. (2009). *Awakening the sleeping giant: Helping teachers develop as leaders* (2nd ed.). Thousand Oaks, CA: Corwin Press.
- Katzenmeyer, M & Moller, G. (2013), *Uyuyan devi uyandırmak: Öğretmen liderler yetis , tirmek*, Çev. Ed. Servet Ozdemir, Nobel Yay ın cılık, Ankara.
- Kementerian Pendidikan dan Kebudayaan. (2019). *Buku penilaian berorientasi higher order thinking skills*. Jakarta: Direktorat Jenderal Guru dan Tenaga Kependidikan.
- Kementerian Pendidikan, Kebudayaan, Riset, dan Teknologi. (2024). *Peraturan Menteri Pendidikan, Kebudayaan, Riset, dan Teknologi Nomor 25 Tahun 2024 tentang Perubahan Atas Peraturan Menteri Pendidikan dan Kebudayaan Nomor 15 Tahun 2028 tentang Pemenuhan Beban Kerja Guru, Kepala Sekolah, dan Pengawas Sekolah*. Jakarta: Biro Hukum.
- King, F. (2017). Evolving perspective(s) of teacher leadership: An exploration of teacher leadership for inclusion at preservice level in the Republic of Ireland. *International Studies in Educational Administration*, 45 (3): 5–21. <http://doras.dcu.ie/22746>
- Koty, S. T. (2020). *Developing teacher leaders through professional development Offered in a District Teacher Forum Offered in a District Teacher Forum*. Dissertation. Walden University. [ScholarWorks@waldenu.edu](mailto:ScholarWorks@waldenu.edu).
- Leithwood, K., Harris, A., & Hopkins, D., (2020). Seven strong claims about successful school leadership revisited. *School leadership & management*, 40 (1), 5–22.
- Lengkong, J. S. J. (2023). *Menjadikan Belajar sebagai "Bintang Penuntun Jalan" Pemimpin Pendidikan: Suatu Ide yang Waktunya Telah Tiba*. Disampaikan dalam Orasi Ilmiah Pengukuhan Profesor bidang Ilmu Manajemen Pendidikan pada bulan November 2023. Tondano: Universitas Negeri Manado.
- Lengkong, J. S. J. (2024). Faktor-faktor penentu kepemimpinan guru: Suatu model konseptual. *YUME: Journal of Management*. 7(1) 1120 – 1138.
- Liljenberg, M & Wrethander, M. (2020). Leadership for school improvement – linking learning to leading over time, *Professional Development in Education*, 1-14 DOI: 10.1080/19415257.2020.1752288
- Lovett, S. (2023). Teacher leadership and teachers' learning: Actualizing the connection from day one, *Professional Development in Education*, 49:6, 1010-1021, DOI: 10.1080/19415257.2023.2235583.
- Muijs, D., Chapman, C & Armstrong, P. (2013). Can early careers teachers be teacher leaders? A study of second-year trainees in the teach first alternative certification programme. *Educational Management Administration and Leadership*, 41(6), 767-781.
- Neumerski, C. M. (2013). Rethinking instructional leadership, a review: What do we know about principal, teacher, and coach instructional leadership, and where should we go from here? *Educational Administration Quarterly*, 49(2), 310-347. <https://doi.org/10.1177/0013161X12456700>
- Nguyen, D. , Harris, A. & Ng, D. (2019) A review of the empirical research on teacher leadership (2003 - 2017): evidence, patterns and implications. *Journal of Educational Administration*, 58(1), pp. 60-80. (doi: 10.1108/JEA-02-2018-0023)
- OECD. (2019). *Teachers and school leaders as lifelong learners*. Paris, France: OECD Publishing, TALIS.

- Öqvist, A & Malmström, M. (2018). What motivates students? A study on the effects of teacher leadership and students' self-efficacy. *International Journal of Leadership in Education*, 21(2) 155–175. doi:10.1080/13603124.2017.1355480.
- Poekert, P. E. (2012). Teacher leadership and professional development: Examining links between two concepts central to school improvement. *Professional Development in Education*, 38(2), 169-188
- Sanocki, S. J. (2013). The process of how teachers become teacher leaders and how teacher leadership becomes distributed within a school: A grounded theory research study. Dissertations. *Educational Leadership, Research and Technology*: Western Michigan University.
- Schott, C., van Roekel, H & Tummers, L. G. (2020). Teacher leadership: A systematic review, methodological quality assessment and conceptual framework. *Educational Research Review*, 13, 1-24.
- Snoek, M. (2014). Developing Teacher Leadership and its Impact in Schools. Dissertation. Amsterdam: aan de Universiteit van Amsterdam.
- Stiffler, K. (2018). Exploring teacher leadership practice, efficacy beliefs, and student achievement. Dissertation. La Verne, California: Universitu of La Verne.
- Sugiono. (2007). Metode Penelitian pendidikan (Pendekatan kuantitatif, kualitatif, dan R & D). Bandung: Alfabeta.
- Sulistya, R. (2019). Heutagogi sebagai pendekatan pelatihan bagi guru di era revolusi industri 4.0. *Jurnal Pendidikan dan Kebudayaan*, 4, 127. 10.24832/jpnk.v4i2.1222.
- Szeto, E & Cheng, A. Y. N. 2017. Developing Early Career Teachers' Leadership Through Teacher Learning. *International Studies in Educational Administration*, 45(3), 45-63.
- Wenner, J. A & Campbell, T. (2017). The theoretical and empirical basis of teacher leadership: A review of the literature. *Review of Educational Research*, 87(1), 134-171.
- Wilson, A. (2016). From professional practice to practical leader: Teacher leadership in professional learning communities. *International Journal of Teacher Leadership*, 7(2), 45-62.
- York-Barr, J & Duke, K. (2004). What do we know about teacher leadership? Findings from two decades of scholarship. *Review of Educational Research*, 74(3), 255-316.
- Yusof, H., Min, Z. M., Jalil, N. A., Noor, M. A. M & Yusof, R. (2018). Teacher Leadership and Its Relationship with Students' Academic Achievement. *International Journal of Academic Research in Business and Social Sciences*, 8(9), 1551–1562.
- Zugelder, B. S. H., Greene, C., Warren, L. L & L'Esperance, M. (2018). Master's students' perceptions toward teacher leadership. *International Journal of Learning, Teaching and Educational Research*, 17(12), 60-77.
- Žydzūnaitė, V. (2025). Teacher leadership in school for student learning: Experiences of Lithuanian teachers. Bad Heilbrunn, Jerman: Verlag Julius Klinkhardt. ISBN: 978-3-7815-2708-9.