

OUT-OF-FIELD TEACHING: EXPERIENCES OF NON-BEED GRADUATES

Antonette E. Torcino¹, Roel P. Villocino, Ed. D.²

¹*Master of Arts in Education Major in Elementary Education, Assumption College of Nabunturan, Nabunturan, Davao de Oro, Philippines*

²*Doctor of Education, Professor, Assumption College of Nabunturan, Nabunturan, Davao de Oro, Philippines*

ABSTRACT

The primary objective of this study is to explore the lived experiences, challenges, coping mechanism, insights and suggestions of non-BEED teachers assigned to teach in elementary department. This phenomenological research study was conducted at Assumption College of Nabunturan, Davao de Oro where 8 non-BEED teachers were selected through purposive sampling and undergone face-to-face in-depth interview. Thematic coding was conducted to analyze the responses of non-BEED teachers regarding their experiences in teaching the elementary department. The findings of the study revealed that teachers were assigned to teach in elementary department is due to the shortage of elementary teachers, having the potential to teach elementary students, and no other vacancy. Out-of-field teachers experienced difficulty in delivering lessons, lack of subject-related knowledge, employing appropriate strategies for the students' age and grade level and managing children's behavior. To cope with the challenges, out-of-field teachers collaborates with experienced teachers, studies and prepares lesson in advance and becoming flexible through watching videos and observing the students to create appropriate strategies. Lastly, teachers suggested to school administrators to hire suitable teacher, strengthen future educators' knowledge, and conduct on-going professional development for teachers assigned to teach outside of their specialization such as exposure, workshops and seminars. Hence, it was concluded to hire qualified teachers for the position. As a recommendation, if out-of-field teaching cannot be prevented, on-going support from the school administrator and out-of-field teachers should have an opportunity to access continuous personal and professional development such as trainings, seminars and motivate to enroll and study in skill-related programs.

Keywords: *out-of-field teaching, experiences, challenges, coping mechanisms, insights, learning, suggestions, qualitative study, phenomenological study*

1. INTRODUCTION

Out-of-field teaching refers to teaching subjects, grade levels, or school types without the required training, certification, or specialization. Although this phenomenon has spread internationally, it is manifested, viewed, and handled differently (Hobbs and Törner, 2014). This is due to various regulations on what qualifies as a professional teacher. For this reason, out-of-field teaching becomes a serious problem and can be easily disregarded in teacher education (Hobbs & Porsch, 2021).

In Australia, a study conducted by the Australian Council for Educational Research (ACER), the results show that 37% of teachers, especially early-career teachers, are likely to be teaching out-of-field. In this research, teachers who are involved in out-of-field teaching say that they accepted the position in their location because of the lack of possible teaching positions. Their need for work prompted their willingness to teach outside of their field (Campanini, 2019).

Out-of-field teaching is common and rampant in the Philippines. The implementation of the K-12 program adds the worsening teacher deficit in the country which influences the decision of school management to assign teachers to teach subject not of their expertise which poses negative effects on teachers' psychological well-being which can hinder the students learning

In Davao de Oro, particularly at Assumption College of Nabunturan, where the researcher is currently teaching, the researcher personally observed the out-of-field teaching phenomenon. At present, 9 out of 13 teachers are

considered to be out-of-field, including the researcher herself. This is due to the small number of applicants applying for the vacant position. This leads the school administrator to fill in the vacancy by assigning teachers who are available and are willing to teach the grade level and the subject.

Since the researcher is an out-of-field teacher, she had a hard time dealing with the students during her first year. This includes preparing teaching materials, students' worksheets, classroom activities and management appropriate for this kind of students. This is due to not being trained with the specific strategies and methods specific for this type of students during her formal training. With these, the researcher asks her colleague who had an experience with these kinds of students, browsed the internet and watched YouTube videos to acquired knowledge to address the challenges encountered.

1.1 Review of Related Literature

Out-of-Field Teaching. According to Du Plessis (2015), out-of-field teaching is the practice of assigning teachers to teaching positions for which they do not have the necessary qualifications or relevant knowledge, whether in a specific subject area or year level. Hobbs (2013) added that out-of-field teaching happens when teachers teach a subject for which they are not competent. This means that out-of-field teachers include teachers that are trained in a specific field but are teaching outside of their specialized field (Du Plessis, Carroll, & Gillies, 2014).

Varied researchers have various notions of out-of-field teaching. Out-of-field teaching was largely unrecognized phenomenon not until it was highlighted by Ingersoll (2011) through his series of work on the subject. He was the one who applied the term to those teachers who are assigned to teach subjects, for which they had no training, education, specialty or any relevant trainings (Salleh & Kalsum, 2014). Out-of-field is also defined by Hobbs and Porsch (2021) to teaching specializations that are developed during initial teacher education, so it is crucial to take into account how teacher education policies and resources affect the environments that promote out-of-field instruction.

Additionally, it may refer to teaching subjects, year levels or school types which the teacher does not have necessary qualifications, certification, or specialization. This becomes common in many countries; however, countries have different way on manifesting and responding out-of-field teaching situation (Hobbs & Porsch, 2021). Moreover, other researcher claims that out-of-field teaching can be divided into four categories based on their job and phase assignment; role displacement, role stretched, phase displacement, and phase stretched (Sharplin, 2014).

Many factors contribute to the hiring of out-of-field teachers. The most apparent reasons frequently cited is lack of funding. Budget cuts appear to be a contributing factor in some school systems' acute teacher shortage. Improper teacher placement is a problem that is also caused by inadequate school administration and other difficulties in the educational system. It is no longer a secret that negligent teacher placement is one of the main obstacles to high-quality education. Teachers being assigned to teach lessons in which they lack expertise is a problem that affects all schools, from private to public, religious to secular, rural to urban, to varying degrees (Sambe, 2015).

In certain countries, schools are effectively bound by funding based on the ratio of teachers which leads to hiring teachers who are willing and competent to teach (Hobbs, 2020).

Hobbs (2013) also cited the lack of qualified teachers as one of the contributing factors. Haycock (2003) and Ingersoll (2009) agree that there is a significant gap in the number of qualified teachers in high-poverty and rural school districts. With this, districts in this area find it challenging to hire qualified teachers (Ingersoll, 2003).

The out-of-field phenomenon is also caused by systemic teacher shortages, inappropriate teacher distribution, scheduling concerns in schools, and the teacher education systems in several nations where teachers are trained as specialists rather than generalists (Hobbs, 2020).

With this, recent discussion over teacher supply has centered on changing demographics and the state economy. On the supply side, when the baby-boomer generation of teachers retires, more fresh instructors are needed to fill their posts. At the same time, many governments facing severe fiscal restrictions are seeking to reduce the teaching employment in order to reduce public expenses (Cavanagh, 2011). On the demand side, lawmakers in numerous states have changed the curriculum so that students must take specific classes in order to graduate from high school. These required graduation requirements could also increase demand for teachers in the near future, regardless of their credentials (Zhou, 2012).

This approach is either decided upon by management or carried out through hiring practices (Du Plessis, 2013). This is understood that the existence of out-of-field teaching practice is also an organizational issue (Ingersoll, 2005). When the "teachers' shortage" matter is examined more closely, it becomes clear that schools mismanage the employment of the teachers they already have, whether or not there are eligible candidates for their vacant positions (Hobbs, 2012).

Management is under immediate pressure to replace educator vacancies; therefore, they are forced to ask educators to teach courses outside of their areas of competence. In this regard, the phenomenon known as "out of field" has both direct and indirect effects on the quality of education. Through the perspectives and experiences of individual instructors, the phenomena might have an effect on the quality of education. Due to various concerns, principals may only base their judgments on how well they believe a teacher can teach a certain subject, or in rare situations, they may simply be based on convenience (Zhou, 2012).

Moreover, teaching out-of-field has something to do with hiring and recruiting process. In a study conducted by Ingersoll, Merrill and May (2015) result reveals that the demand for and supply of teachers show how poorly instructors are recruited and retained. As a result, more teachers are leaving the profession and taking on non-specialty positions. The implementation of hiring, staffing, and planning procedures at the school is also to blame for the subject assignment being out of sync, not just because of teachers' shortages.

Furthermore, out-of-field teaching is a common problem encountered due to the lack of qualified teachers produced by an educational institution or teachers applying for the position (Apuro, 2022). The findings also highlighted how certain approaches to filling vacancies in classrooms, such as recruiting instructors who aren't completely qualified, reassigning teachers with a different field of expertise, or using substitute teachers, are all related to out-of-field teaching.

In her study, Du Plessis (2013) stated that qualified teachers become unqualified when they are assigned to teach subjects or year levels for which they do not have the necessary qualifications. Du Plessis, Carroll, and Gillies (2014) expressed the opinion that out-of-field teachers are less prepared to teach courses for which they lack the necessary credentials since they are still in the early stages of their professional development.

Out-of-field teaching is easily overlooked considering that each countries have different qualification on what constitutes a professional teacher. According to Craig (2016) secondary school teachers are typically trained as specialists in two areas, emphasizing that extensive content knowledge is required to teach at the secondary level. Internationally, the education of primary school teachers is more varied, with some nations training their teachers to be generalists who can instruct a variety of subjects at the elementary level.

Experience of Out-of-Field Teachers. The experiences of out-of-field teachers encompasses a unique set of challenges and opportunities that arise when teachers are assigned to teach subjects or grade level outside their area of expertise. Out-of-field teachers agree to teach a subject despite their lack of expertise (Hobbs & Törner, 2014). The lack of knowledge leads teachers' additional research work and additional study prior to the beginning of class (Pillay, Goddard, & Wilss, 2005 as cited in the study of Pacaña, Ramos, & Catarata, 2019).

A teacher must be sufficiently prepared before the class but in the case of out-of-field teachers, it makes teaching difficult since they will be teaching outside their expertise (Kim et al., 2018). In addition, according to a personal contact from a Western Australian State School Teacher's Union organizer, teaching outside of the classroom is a factor that raises teachers' stress levels. The extra demands of planning and implementing curriculum for an unfamiliar subject for which they have not had university preparation are thought to be a particular challenge for recent graduates (Ingersoll, 2001).

Challenges of Out-of-Field Teachers. Out-of-field teachers experienced set of challenges they encountered teaching students beyond their expertise. These challenges include difficulties managing students' motivation, worries about choosing the best instructional tactics, a lack of background information, and a lack of support (Caylao, 2015). In a study conducted by Hobbs and Porsch (2021) it is difficult for teachers to teach outside of their subject area since they must study new material, which entails not only time and effort during their teaching obligations but also an in-depth understanding of learning processes.

Since out-of-field teachers do not have a specialization regarding with their new assignment, lesson that is going to be taught takes a lot of time to prepare (Ramli et al., 2017). This interferes with their ability to prepare for other classes and deprives students of opportunities for further study, interest, and critical thought. With this, teachers may feel lacking and pressure (Co, Abella, & De Jesus, 2021).

Moreover, the distribution of a teacher's preparation time among all of their courses may change if they are given the responsibility of instructing in a subject area in which they lack any expertise. They might shorten the time allotted for other courses in order to devote it to preparing for the course or courses in which they have no prior knowledge. It takes more time for an out-of-field instructor to concentrate on learning new subject material than it does to grasp the needs and interests of his students (Salleh & Darmawan, 2013).

Out-of-field teachers are often not confident to take risks in unfamiliar subjects or year levels because they feel exposed in unfamiliar subject territories (Du Plessis, Carroll, & Gillies, 2014). These teachers may not have the knowledge of the subject matter as well as the skill to teach this subject because they are not qualified. Understanding was that out-of-field teacher lacked knowledge and pedagogical skills (Hobbs, 2012). Out-of-field teachers are found to be unqualified for the subject or grade level they were assigned and are insecure due to a lack

of pedagogical competence (Du Plessis, Carroll & Gillies, 2014). Mizzi (2013) asserts that teachers who teach outside of their areas of expertise experience significant difficulties in lesson planning. This is due to facing unfamiliar content in the subject which teachers do not have university preparation.

Coping Mechanism of Out-of-Field Teachers.

Careful planning of the lesson by formulating their syllabi is one of the coping mechanisms mentioned in a study conducted by Bughao (2021). They also prepare themselves for the delivery of education, which involves pedagogical and topic knowledge, in addition to these curricula. The logical sequencing and pacing of lessons are provided by instructional planning, according to Villena and de Mesa (2015). Additionally, he added, it gives teachers a feeling of direction. Thus, with careful planning, preparation, and enthusiasm in what you are doing, practical teaching can be accomplished (Alanazi, 2019). Because all the necessary material has been acquired, the class flows well when the teacher is clear about what has to be done. As a result, the specifics are predetermined.

Moreover, out-of-field teachers also employs varied teaching approaches to meet the diverse needs of the students. According to Brodhagen (1998) as cited in the study of Bugwak (2020), teachers must learn to use a variety of teaching strategies if they are to reinforce the students' learning. He also made a point of saying that the kids' understanding will be improved. Levy (2008), as cited by Gentry (2013), claims that educators have a duty to ensure that all pupils are meeting the criteria. By utilizing diversified instructional tactics, teachers may address the requirements of every student and encourage them to go above and beyond the standards.

Furthermore, out-of-field teachers survived being assigned to teach outside their specialization by asking colleagues. According to Mizell (2010), teachers face variety of difficulties, including those related to classroom management, education, curriculum, and school culture. Researches also demonstrates that after just two years, new instructors who receive rigorous mentoring have a considerable impact on student progress.

Insights of Out-of-Field Teachers. Despite facing difficulties, out-of-field teaching provides opportunity for personal and professional growth. The teachers' will to take the assignment as a responsibility and the eagerness to fulfill their role to deliver quality instruction, make it possible to overcome the challenges that they will encounter along the way. This is supported by Hobbs (2013) which stated that the teachers' desire to learn and grow as a teacher is fueled by a passion for the profession.

The best ways for teachers to learn are through study, practice, reflection, collaboration with other teachers, close examination of students' work, and sharing of what they observe. This type of learning cannot take place in college classrooms or in K-12 classrooms that are cut off from understanding of how to analyze practice. This also happen through continuing professional development which allows teachers to discover what they have not learn yet relating to their new assignment (Kenny, et. al., 2020).

When teachers are assigned to teach outside their expertise, they become more flexible. Teachers should adopt a flexible mindset since learners look to them to be in charge and take command of any circumstance, regardless of their own stress levels. Teachers that continuously put students' needs first in their work exhibit flexibility and versatility (Kelly, 2016).

Moreover, teachers' "enthusiasm, creativity, flexibility, and adaptability" and the academic achievement of their students have a favorable association. The ability to improvise and adjust to new demands and obstacles, learn and improve teaching techniques, and make the content being taught interesting and pleasurable are all assets for the teacher who wants to share their passion for the subject with the pupils (Panisoara, Duta, Panisoara, & Tomoaira, 2014).

Suggestions of Out-of-Field Teachers to Administrators. Suggestions made by out-of-field teachers include hiring qualifies teachers, appropriate assignment of teachers and ensuring teachers are competent to teach different subjects especially in primary schools since these will affect the total learning experiences of the learners and the quality of instruction.

To ensure the hiring of qualified teachers, a change in policy is the first solution. The first step is to put in place a system that will make sure all teachers at the primary school level, for example, are competent to instruct all lessons across all grade levels at that school. The second alternative is to promote a different course for obtaining teaching certification. The regulation might be changed so that any student could become a teacher as long as the student has a bachelor's degree in the primary subjects taught in elementary and high schools, rather than just hiring college students who are enrolled in teaching-career courses (history, math, and the like) (Sambe, 2015).

Furthermore, in a study conducted by Kim (2014) in a case where out-of-field teaching might occur, immediate response from the government is needed such as the "Minor Qualification Education" in South Korea which allows teachers to teach outside of their areas of expertise. This action encourages teachers to acquire relevant training so they can manage a new subject. This demonstrates the necessity to assist and acknowledge the issues faced by out-of-field teachers. This means to say that government must acknowledge the phenomenon to take appropriate action.

Moreover, primary school teachers are educated as experts in other nations (or within countries, such as in various states of Germany (Porsch, 2020). Teachers teach practically all lessons and subjects in a given class since pupils at such a young age require a consistent contact with a restricted number of people at school. Thus, out-of-field teaching is expected to occur in many primary schools as a result of this alleged class-teacher principle (Hobbs & Porsch, 2021).

Related Studies

According to surveys, during the first few years of teaching, teachers are most likely to teach outside of their subject area (Luft, Weeks, Hill, & Raven, 2013). However, becoming a teacher requires a number of development tasks to be mastered, including creating a professional teacher persona, understanding models of student-focused teaching, and acquiring receptive classroom management skills (Keller-Schneider, 2020).

According to Singh, Luft, and Napier's (2020) study in this special issue, newly hired out-of-field teachers frequently require more help than their counterparts. This scenario is addressed in their study. They contend that in-school mentoring programs could aid these teachers in addition to the provision of top-notch teaching materials. It is evident that confronting the transition from initial teacher education to novice means that coworkers and school administrators can offer resources for the out-of-field instructors.

Moreover, in the study conducted by Hobbs and Porsch (2021) out-of-field teaching presents obstacles for teacher learning at all stages of teacher education. This special issue contains six studies that examine the out-of-field phenomenon from three perspectives: (1) transition from initial teacher education to novice, (2) ongoing teacher learning, and (3) formal professional development (PD).

Because the phrase "out-of-field" refers to specializations created during initial teacher education, it is crucial to analyze how teacher education policies and provision contribute to the conditions that lead to out-of-field teaching. Universities also have a responsibility to prepare instructors for the education system into which they are entering; so, beginning teacher education must explore how to account for the possibility that teachers will be obliged to teach out-of-field at some time in their careers (Campbell, Porsch & Hobbs, 2019).

Ultimately, it is the responsibility of teachers to learn how to teach a new subject. Teachers can approach this with adaptability, resilience, openness, and attention, and they can frequently dedicate a significant amount of time and energy to this process. As Hobbs and Quinn illustrate in this special issue, instructors are frequently obliged to learn 'on-the-job,' often without the support systems. The subject matter of a teacher's out-of-field and in-field subjects; the stability of their teaching load; their teaching experience; the type of support teachers receive; leadership attitudes and decision-making practices; and the dispositions of the teacher as learner all influence the focus of teacher learning (Hobbs & Porsch, 2021).

Moreover, research indicates that, even when professional development courses are accessible, teachers may opt not to participate in them for a variety of reasons. These reasons can include a preference to use their professional time and budget for their in-field subject/s, a lack of interest in improving their teaching in their out-of-field subject, teaching the out-of-field subject intermittently or for a short period of time, so it may not seem relevant for their long-term career, and fear of being permanently moved to the out-of-field subject (Hobbs & Porsch, 2021).

Furthermore, in a study conducted by Caldis (2022) out-of-field teaching is considered to be the most stressful aspect of early-career teachers. This early-career teacher described feeling so overwhelmed by the responsibilities connected with having to learn and teach new disciplines that she felt obliged to withdraw from the study. Another stated that in her first job as a casual relief teacher, she was required to teach art, commerce, legal studies, future learning, and geography. Despite their lack of knowledge in these disciplines, the other participants were mostly expected to teach business studies and commerce. Some participants also mentioned that, despite being the sole geography specialists in their schools, they were nevertheless required to teach outside of their area of expertise and to assist other non-specialist teachers in teaching their subject.

With this, majority of new instructors reported feeling "overwhelmed" by their out-of-field teaching experience, and one indicated severe anxiety. They not only attributed this to the stress of needing to be proficient in both material understanding and delivery, but they also stated that classroom management was a major issue in their out-of-field classes, which added to the pressure. These early-career teachers worried that they might not be able to deliver quality teaching expected by the students (Caldis, 2022).

Research conducted in Germany has shown that out-of-field education has a detrimental effect on teachers' self-efficacy, which in turn has an impact on students' learning results. The number of pupils who are taught by such out-of-field teachers across their specialty has a lower self-concept. In the Irish context, this problem can only be overcome if out-of-field instructors receive support from the authorities through efficient professional development programs to ensure quality education (Porsch & Wendt, 2015).

Furthermore, in the Irish context, this issue can be remedied only if out-of-field instructors receive authority support through appropriate professional development programs to ensure quality education. Hobbs (2012) also believes that

teaching across specializations has an impact on professional self-efficacy. This study contends that the meaning of lived educational experiences across specializations impacts a conducive learning atmosphere to promote quality instruction.

1.2 Research Questions

The following research questions served as a guide for this study:

1. What are the lived experiences of out-of-field secondary teachers in teaching elementary students?
2. What are the challenges experienced by the out-of-field secondary teachers in teaching elementary students?
3. What coping mechanisms did the out-of-field teachers employ in addressing the challenges and difficulties encountered?
4. What are the insights of the out-of-field teachers with regards to teaching elementary students?
5. What suggestions can out-of-field teachers make to school administrators on the assignment of non-BEED graduates to teach elementary students?

2. METHODS

This study utilized qualitative research specifically phenomenological research design. In qualitative research, the subject is interpreted in its natural environment (Guba & Lincoln, 1994 as cited in the study of Sari & Nayir, 2020). Qualitative research, will perceive the experiences of individuals in a humanistic, interpretive approach. Moreover, quantitative research helped the researcher to access the thoughts and feelings of research participants, which enabled the researcher to develop an understanding of the meaning that the participants ascribe to their experiences. Furthermore, this qualitative research employed phenomenology as a qualitative research design. Phenomenology as qualitative research design, focuses on the understanding on how human beings experience the real world as it gives the researcher the benefit to interpret the participants perspective on their experiences (Austin & Sutton, 2021).

3. RESULTS AND DISCUSSIONS

Reasons of Being Assigned to Teach Elementary Department. The most common reason is the shortage of elementary teachers which results to assigning teachers outside their expertise. According to Ingersoll and Perda (2010), schools may assign teachers to teach subjects or grade levels as a short-term alternative to close instructional gaps and address staffing concerns.

Another reason for being assigned to teach in elementary is having the potential to teach elementary students wherein it becomes the administrator's decision. This is supported by Zhou (2012) which states that principal may only base their judgement on how well they believe a teacher can teach a certain subject.

Finally, there was no other vacancy. With this, school administrators then rush to fill the job with another instructor, frequently one with no previous experience teaching in that area (Bayani & Guhao, 2017). The informant revealed during her application that the only position available was for a Filipino teacher at the elementary level, which led her to accept the assignment. For this reason, the teacher accepted the position because of her willingness to teach. With this, out-of-field teaching is tolerated in the professional lives which leads to the question from what a teacher is certified to teach or specialized in to what they are "competent" and "willing" to teach (Hobbs, 2020).

Reactions when Assigned to Teach Elementary Students. Upon learning that they would be teaching a subject or grade level outside their field, the participants revealed that they were surprised or shocked. It can be overwhelming to suddenly be responsible for teaching unfamiliar content at a grade level for which you have not received any training. This is supported by Caldis (2022) that teacher described feeling so overwhelmed by the responsibilities connected with having to learn and teach new disciplines in which it is considered the most stressful aspect of early-career teachers.

The finding also showed that teaching outside one's field can also lead to frustration and stress due to students constantly seeking attention and managing student's behavior appropriate for their age and grade level. According to Caldis (2022) they not only attributed this to the stress of needing to be proficient in both material understanding and delivery, but they also stated that classroom management was a major issue in their out-of-field classes, which added to the pressure.

Moreover, teachers overthink their lack of knowledge and expertise, which makes them question their capability to handle their new assignment to meet the needs of their students which affects the teachers' self-efficacy (Porsch and Wendt, 2015).

Feelings when Teaching Elementary Students for the First Time. The result reveals that teachers feel nervous when they teach elementary students for the first time due to lack of knowledge. This was affirmed by the study of Napier et. al. (2020) out-of-field teachers will experience difficulty in their first year in the way they teach.

They were also uncertain about their knowledge, skills, strategies and activities. This is in line with Du Plessis (2019) wherein teachers who are teaching subjects they do not mastered are afraid that the knowledge they share to their students are not enough to affect their future.

Moreover, teachers also find being assigned outside of their expertise stressful. The finding revealed that the constant attention-seeking character of elementary students annoys the teacher and, at the same time, cannot pacify children when they misbehave. This is supported by Co, Abella and De Jesus (2021) that teachers get stress dealing with students when they are teaching outside of their specialization.

Reactions/Feedbacks Given by Students. This study reveals that some students find their teachers strict and intimidating. For these reasons, children fear their teachers and would listen to their teachers out of fear. The fear of their teachers prompts the students to listen and behave well during the discussion. According to Weimer (2009) students learn that teachers have the authority to punish them. Because they want to avoid receiving consequences such as being reprimanded, the students comply to the teachers' authority.

Furthermore, students got excited and find their teachers good in teaching and with a loud voice. Since this is face-to-face discussion, the students are excited and their excitement is visible on their faces. This study also reveals that having a loud voice is good in teaching elementary.

Finally, students feel always sleepy. The study shows this is due to not being interested and being close minded in the subject being taught. The teacher doubts the effectivity of her instruction, though, confirmed effective through students' positive results. This usually happens when the teachers do not have enough knowledge on how to maintain and contain the students' interest during the discussion.

Best Experience as a Teacher of a grade level of not Expertise. Throughout a teacher's career, teaching experience has been associated with improved student achievement. However, this study shows that despite not teaching in their field of expertise, teacher had notable experiences when teaching elementary students such as having fun while teaching amazed by own strategy. One of the notable characteristics of a teacher is not setting aside any challenges, thus, look for ways to surpass hardship. This finding is consistent with Ponsaran (2017) who emphasized the Filipino willingness and adaptability in responding to every situation.

On the other hand, even the teacher was not trained with strategies and methods tailored for elementary children, she found personalized strategies that suits best to the child's need which she finds amazing. Moreover, teacher also find it fulfilling to see the learning progress of the students especially in successfully applying the concepts being taught during discussions in real-life. Having an appropriate strategy in teaching is necessary so that the teacher can share information that students need to acquire in the 21st century (Nuangchalerm, 2020).

Finally, the love of children. This makes the teacher love the subject being taught, thus, enabling her to create suitable strategies that will help student. One of the teachers admitted that this changes his perspective about the children. This fuels the teachers' passion to exert more effort. This is supported by Hobbs (2013) that passion will lead teacher to learn and grow in their profession.

Challenges Encountered as a Teacher of a Grade level of not Expertise. The participants in this study are not equally knowledgeable as to the subject is concerned. This poses significant problems for teachers who teach outside of their areas of expertise (Mizzi, 2013). One participant admitted that she finds it difficult to deliver the lesson of a subject that is not within her expertise. According to National Board for Professional Teaching Standards (2017) teachers should know the subjects they teach and how to teach those subjects to students.

Participants also expressed difficulty in using teaching strategies, techniques and programs to use when dealing elementary students considering that they are not trained to do so during college. The lack of teaching strategies and approaches hampers effective teaching (Kathirveloo, Puteh, & Matematik, 2014). Although it can be learned through experience, formal training is still more effective.

Moreover, teachers may struggle to connect concepts across the curriculum or make meaningful real-world connections such as giving contextualize examples due to their level of understanding. This happens because the teacher is assigned to teach a grade level which they are not qualified to. The unfamiliar material makes the teacher unable to give meaningful example to the life of the students might affect students' learning which lowers the success level. Teacher could rely on tried-and-true but inefficient teaching strategies (Hobbs, 2015).

Problems Encountered in Teaching Elementary Students. The participant expressed a lack of knowledge about operating laboratory equipment, especially technical matters. This makes the teacher afraid to make mistakes when providing answers or explanations to students who seek clarification during the learning process. According to Caldis (2017) as teachers teach outside of their areas of expertise, it can cause professional self-doubt and even result in teachers quitting their jobs.

Another participant expressed that she is not an expert on the subject she is assigned to teach since she did not major in the subject being assigned to her. The lack of knowledge makes the teachers to exert more effort to conduct research about certain topics before the class or will ask other teachers who specialized the subject for additional information or an explanation. This is supported by Pillay, Goddard, & Wilss, (2005) that the lack of knowledge leads teachers' additional research work and additional study prior to the beginning of class.

Kola and Sunday (2015) stressed that it is obvious that all teachers must possess subject-matter expertise. This means that teachers should be equipped with subject-related knowledge and be effectively able to explain it to the pupils, which determines their success. Jeschke et al. (2021) emphasized in their study that for teachers to teach effectively, they must have subject-specific information, such as topic knowledge and pedagogical content knowledge, as well as the capacity to apply such knowledge in challenging classroom scenarios.

Another emerging theme in this study is preparing and studying the content. Since teachers are assigned out-of-field, teachers need to spend extra time researching and preparing lessons to ensure they provide accurate, meaningful instruction and appropriate instruction. This situation demands not only time and effort during their teaching responsibilities but also in-depth familiarity with instructional strategies (Hobbs & Porsch, 2021).

Meanwhile, there were teachers who expressed difficulty with classroom management, approach to use and how to make students understand. Tomlinson (2023) emphasized effective "classroom management" is inseparable from effective teaching. When "what" we teach and "how" we teach are dynamic, varied, sometimes surprising, often pleasant, and meaningful, students as well as teachers feel free of the responsibilities involved in teacher-student power conflicts.

In addition, participants expressed encountering problem on approach to be use for the learners to love learning and the process of learning. Although some teachers undoubtedly have a special talent for making pupils learn, effective teaching also requires teachers to have a thorough knowledge of the academic material, the child development process, and the learning process itself (Roth & Swail, 2000). In the case of out-of-field teachers, it makes teaching difficult since they will be teaching outside their expertise (Kim et al., 2018).

Worst Experienced as a Teacher of a grade Level of not Expertise. The initial experience of teaching outside one's field can be overwhelming. The emerging theme showed that the teachers worst experiences may vary depending on the specific circumstances and the teachers' personal characteristics and experiences. One of which is managing and dealing children's behavior. Since the teacher did not have any specialization and training in dealing with children at this level, it makes teaching difficult for teachers. Aside from being prepared for the lesson, the teacher should know how to deal with this type children. According to Roth and Swail (2000), teachers should have a thorough knowledge on child development process, and the learning process for effective teaching.

Moreover, teachers receive bad feedback and being questioned. While feedback is necessary for personal and professional growth, there are some feedbacks that are distressing for teachers. One participant mentioned questioning her teaching capability. In the study conducted by Recede, Asignado, & Castro, (2023), they emphasized that a good indicator of teacher's effectiveness is the teacher's self-efficacy for an effective school and academic program.

On the other hand, this study also revealed that the teacher was questioned about the appropriateness of her test questionnaire for elementary students. Teachers who experienced this doubted their capability in effectively teaching the students and thought of quitting their assignment. When this happens, teachers may feel lacking and pressure (Co, Abella, & De Jesus, 2021). It is also supported by Klassen and Chiu (2010) who emphasized how teaching experiences affects teacher's self-efficacy.

Ways of Dealing with the Problems Encountered in Teaching Elementary. The teachers collaborate with colleagues who have expertise in the subject and grade level they are teaching. By asking experienced teachers, they can share their learning resources, lesson plans, and instructional strategies that actually work and appropriate for teaching elementary. Collaboration between teachers is beneficial for both learning and teaching (Stigmar, 2016).

Collaborating with fellow teachers who are more knowledgeable in a specific grade and/or subject is further supported by Vygotsky's theory of Social Constructivism (1978) which explains the significance of having persons with sufficient knowledge (MKO) in an object to guide and assist with knowledge demands. Moreover, Mizell (2010) in her study reveals teachers who are teaching outside of their specialization survived by asking their colleagues and will have considerable impact on student progress once they received rigorous mentoring.

The teachers expressed the necessity to face the problem. Considering that it is assigned to them, it become their responsibility. The teachers must think first of the welfare of their students over them. By doing so, the teachers must observe the students. Out from that observation, the teachers can now make strategies that will work and are appropriate to their learning needs and developmental level. According to Ingersoll (2011), teachers need to consider students' learning as his first consideration and goal for effective teaching and learning.

Though observing students takes more time from out-of-field teachers, this is seen as a necessity to cater the interests and needs of the students. According to Kenny, et. al. (2020) this can be done through study, practice, reflection, collaboration with other teachers, close examination of students' work, and sharing of what they observe and through continuing professional development which allows teachers to discover what they have not learn yet relating to their new assignment.

Coping Mechanism with the Negative Feedback of Performance in the Class.

One participant says that if one strategy no longer suits the needs of the students, he will use another method to ensure learning. The teacher finds suitable strategies that responds best to the needs of the students to ensure learning. Brodhagen (1998) as cited in the study of Bugwak (2020), expressed that teachers need to apply various teaching strategies to reinforce students' learning.

The finding revealed that talking to students after the class clears misunderstandings and provides an opportunity to impart values. This is the teachers' way to clear misunderstanding among the learners. Ndethiu (2019) affirmed that teaching is also interpersonal, where communication between teacher and students is important.

Further, this emerging theme also shows that teachers need to be flexible to quickly adjust their instructional methods, find alternative resources, and accommodate different learning needs. With this, teachers find ways by watching videos to gain additional teaching strategies that are tailored in teaching elementary students. This is supported by Panisoara, Duta, Panisoara, & Tomoica (2014) who contended that the ability of teachers to improvise and adjust to new demands and obstacles, learn and improve teaching techniques, and make the content being taught interesting and pleasurable are all assets for the teacher who wants to share their passion for the subject with the pupils.

Finally, learning from the feedback received. These feedbacks will help teachers become better teachers. May it be in their teaching approaches, strategies, classroom management, building relationships with students, and establishing authority in the classroom. According to Springer and Hunter (2022), teachers grow as professionals and enhance their skills as a result of direct feedback on their performance.

Insights Gained from Teaching Elementary Students. The study revealed that elementary classrooms are enjoy and lively. While teaching outside their expertise, teachers revealed that they are also learning from the subjects being taught as they exert effort to study the content to give accurate knowledge and information to their students. According to Du Plessis (2020) learn new things and think that teaching a subject they don't fully understand will benefit their career as teachers.

Moreover, teachers must be adaptive and flexible. The need for teachers to adapt and be flexible with the unfamiliar learning environment is necessary when they are assigned to teach out-of-field. These will help teachers adjust their teaching strategies, employ engaging activities that are developmentally and able meet the learning needs of the students. This is supported by Kelly (2016) which contends that when teachers are assigned to teach outside their expertise, they become more flexible. Teachers should adopt a flexible mindset since learners look to them to be in charge and take command of any circumstance, regardless of their own stress levels. Teachers that continuously put students' needs first in their work exhibit flexibility and versatility.

Learning Gained from Teaching Elementary Students. The emerging themes in this structured theme are learned to handle elementary student's behavior, a lot of learnings from children, sense of belongingness, versatility, consistency, become more understanding, not easy, balance, become flexible and adaptive, and patience.

Behavior issues are present at any age (Pruitt, 2017). However, children in elementary requires more assistance and attention in managing them. The finding of this study reveals that along the way teachers learn to handle student's behavior by observing them. Understanding students give teachers an idea what motivates and demotivates students especially in terms of giving grades. Their knowledge about the children helps them not just to understand children in elementary, but also those in higher level.

Meanwhile, teachers also learn that teachers need to provide supportive learning environment where students feel safe to express their thoughts and idea in class. The teachers should also consistent and balance discipline without compromising the quality of instruction. According to research classroom environment influences the students' motivation, and motivated students exert more effort during teaching-learning process (Ambrose, et. al. 2010).

Finally, not only children learn from their teachers but also their teachers. This means to say that teachers are also learners. As you deal with children, you will get valuable learnings that you cannot get from reading textbooks and journals nor browsing YouTube. Du Plessis (2020) agrees that out-of-field teachers see this as an opportunity to gain new knowledge and believe that this can help them with their future endeavor as a teacher.

Suggestion Can Give to School Administrator as a Non-BEED Graduates assigned to Teach Elementary.

Among the suggestions, school administrators should hire suitable or BEED teachers. Participants emphasized that these teachers are trained and are equipped with necessary knowledge tailored for elementary students. Kathirveloo

et al. (2014) also discovered that there is a strong association between what the teacher knows, how they know it, and what they are able to do with that knowledge when teaching. It is further supported by Hobbs & Törner (2019) who contends that qualified teachers assigned to their field of expertise and specialization are likely to have higher levels of self-efficacy than out-of-field teacher.

Another suggestion given was conducting training for exposure. This finding revealed that through this, non-BEED graduates assigned to teach elementary students will have an idea on how to deal with elementary students. Kloosterman (2013) emphasized that the most significant advantage of carefully planned continuous professional development protects the public, the employer, the professional, and the professional's career. She continued by saying that professional development guarantees a teacher's capacity to keep up with the most recent standards established by others working in the same field.

Finally, the need to strengthen the future teacher's knowledge during college since they will be the one who will shape the future students of the school. Teachers can further be supported through appropriate teacher preparation, support of ongoing teacher learning, and formal professional development programs or courses (Hobbs & Porsch, 2021).

3.1 Implications for Practice

Based on the findings, the following implications for practice are offered.

On Reasons of Being Assigned to Teach Elementary Department. It can be reckoned that the research participants were assigned to teach elementary students for different reasons such as shortage of elementary teachers, having the potential to teach elementary students in the elementary and no other vacancy. For these reasons, the school must invest in its teachers. They play a huge role in providing quality education to the school's clientele. This also implies that schools can create policies and programs that can help support and prepare teachers to be flexible on teaching assignments.

On Reactions when Assigned to Teach Elementary Students. As noted in the result of this study, the participants expressed various reactions when they were assigned to teach elementary students. The unexpected assignment is the reason behind such a reaction. With the right support and more professional development during the school year, such as seminars and trainings for teachers assigned to teach outside their expertise, they can become more confident and effective in teaching younger students. Teachers assigned to teach outside of their expertise must remember that teaching is a continuous learning process. Being open to trying new strategies, seeking support when needed, and reflecting on practice can contribute to growth and improvement as a teacher.

On Feelings when Teaching Elementary Students for the First Time. Non-BEED graduates may experience a range of feelings when they teach elementary students for the first time. For teachers, it is important to acknowledge and manage their emotions effectively by seeking support from colleagues, mentors, or attending professional development opportunities. Recognizing the impact of their emotions on practice allows them to grasp positive feelings and address any challenges that may arise, ultimately leading to a more effective and enjoyable teaching experience.

On Reactions/Feedbacks Given by Students. In view of the reactions and feedback given by the students when non-BEED teachers teach for the first time, it can be said that these help teachers improve and adjust their ways of dealing with the students in terms of content knowledge and teaching strategies to accommodate the needs of the elementary learners. Also, these can be put to use by teachers to emphasize hands-on activities, interactive learning, engaging instructional techniques, active classroom management strategies, and adapting their expectations to align with the developmental needs of younger students.

On Best Experience as a Teacher of a grade level of not Expertise. The participants had various experiences, which indicates that teaching elementary can be a fulfilling and enriching experience for them. There were participants who had fun teaching, got amazed by their own strategies, learned traits that are long forgotten as they grow up, and changed their minds on certain subjects. Hence, teachers become more open-minded to varying developmental needs, embrace their unique characteristics, and develop genuine interest in their students' well-being.

On Challenges Encountered as a Teacher of a Grade level of not Expertise. Since teaching elementary students is not their expertise, teachers encountered different challenges. The participants expressed the following challenges: how to deliver lessons, teaching physics, techniques and programs to use, challenging children's behavior, children's basic knowledge, and teaching at different levels. This indicates that teachers need all the support they can get from experienced or seasoned teachers and administrators to cope well with these challenges. They need to work hand-in-hand to get them through their period of adjustment.

On Problems Encountered in Teaching Elementary Students. The participants convey there are different problems encountered in teaching elementary students such as lack of knowledge in laboratory, learner's retention of focus, classroom management, not expert on subject to teach, basic foundation not mastered, preparation and study on the content, approach to be use and how to make students understand. Teachers need to continuously discover appropriate teaching strategies, seek professional development such as attending trainings and seminars that can widen their understanding of teaching elementary students, and collaborate with colleagues for advice and learning resources.

On Worst Experienced as a Teacher of a grade Level of not Expertise. As noted in the findings of this study, the worst experiences of teachers were managing on children's behavior, children's spelling and grammar problem, dealing children's behavior, receiving bad feedback, not into child, cleaning child's poop and being questioned. For these reasons, teachers may attend professional development sessions, consult colleagues, or engage in self-study to enhance their understanding and to assist teachers in these situations. The school can also show its support by providing other learning resources that can assist teachers in successfully navigating these teaching situations.

On Ways of Dealing with the Problems Encountered in Teaching Elementary. To deal with problems encountered in teaching elementary, teachers find ways to deal with them such as face, observe and make strategy, ask opinion/strategy of co-teachers, make interaction with the learners, being prepared mentally and physically, love and accept children, study and make strategy, face the problem, and acceptance. Teachers need to face this new assignment. To create and employ teaching strategies and methods appropriate for the grade level, teachers may need to observe and have constant interaction with their students and may ask for opinions and strategies from teachers who used to teach elementary students. Finally, it is important for teachers to prepare holistically to effectively address the problems encountered during the teaching-learning process.

On Coping Mechanism with the Negative Feedback of Performance in the Class. The non-BEED graduates assigned to teach elementary students cope with the negative feedback by shifting of approach, talking to student after class, modulation of voice, becoming pleasant, finding ways by watching videos, not taking it seriously, learning from it, controlling loud voice, and becoming flexible. Having effective coping mechanisms can help teachers maintain their well-being and professional growth. Through various coping mechanisms, teachers learn to manage the children in their class effectively. One teacher said not taking it seriously since it causes stress and learning from feedback.

On Insights Gained from Teaching Elementary Students. The findings showed that non-BEED graduates assigned to teach elementary students have various insights such as enjoy and lively, learning while teaching, not easy, work harder, go beyond comfort zone, elementary learner's mind is fragile, need of repetition teaching, deal with new environment and things, learn from children and being flexible. These insights convey that despite not being assigned to their expertise, they gained insights that can be used to deal with the students better, whether in elementary or high school. Hence, being assigned to elementary students can be a learning opportunity for personal and professional growth.

On Learning Gained from Teaching Elementary Students. As pointed by the participants the learnings they gained from teaching elementary students were handling elementary student's behavior, a lot of learnings from children, sense of belongingness, versatility, consistency, become more understanding, not easy, balance, become flexible and adaptive, and patience. Hence, the learning gained by teachers helps them tailor their instructional approaches and strategies to meet the developmental needs of their students. Teachers will also learn to be flexible in their teaching strategies and methods, employ engaging instructional techniques such as hands-on activities, and incorporate games to maintain children's interest and support learning.

On Suggestion Can Give to School Administrator as a Non-BEED Graduates assigned to Teach Elementary. Participants pointed out hiring suitable or BEED teacher and not to accepting students that cannot be cater. The participants believe that hiring BEED teachers is necessary since they are trained to deal with elementary students and manage classrooms tailored for elementary students. In addition, among the suggestions given to the school administrator was to conduct training for exposure and strengthening future educators' knowledge. The participants express that if the school cannot hire BEED teachers, preparation is necessary since there is a possibility of assigning non-BEED graduates to teach elementary students. Hence, it may require additional preparation and professional development, such as attending seminars and trainings to become familiar with the elementary curriculum and teaching methods. The results also suggest that teachers may seek guidance from experienced elementary teachers or may attend elementary classes to develop and equip themselves with effective classroom management strategies and teaching strategies specific to elementary students.

4. CONCLUSIONS

The investigation focuses on out-of-field teaching and highlights the challenges and opportunities it presents for educators. When teachers are assigned to teach outside their area of expertise, they may initially feel stressed and unprepared, but they can develop strategies to navigate these challenges effectively. Seeking support, collaborating with colleagues, accessing resources, and participating in professional development programs can enhance content knowledge and pedagogical skills.

Flexibility, adaptability, and a growth mindset are crucial when teaching out-of-field, as teachers should approach it as an opportunity for personal and professional growth and skill development. Effective communication with colleagues and administrators, clear expectations, and involving support systems are essential. Out-of-field teaching can foster resilience, adaptability, and personal growth for teachers.

Finally, administrators should provide targeted professional development opportunities and comprehensive support to empower teachers in out-of-field positions. This support enhances instructional effectiveness and contributes to the overall success of teachers and students.

5. REFERENCES

- [1]. Alanazi, M. H. (2019). A study of the pre-service trainee teachers problems in designing lesson plans. *Arab World English Journal (AWEJ)*, 10(1), 166–182. <https://awej.org/images/Volume10Number1March2019/15.pdf>
- [2]. Ambrose, S., Bridges, M., Lovett, M., DiPietro, M., & Norman, M. (2010). *How learning works: 7 research-based principles for smart teaching*. San Francisco, CA: Jossey-Bass
- [3]. Apuro, Y. (2022). Issue on out of field teaching. <https://depedbataan.com/wp-content/uploads/2022/04/ISSUE-ON-OUT-OF-FIELD-TEACHING.pdf>
- [4]. Bayani, R. & Guhao, E. (2017). Out-of-Field Teaching: Experiences of Non-Filipino Majors. *International Journal of Education, Development, Society and Technology* (2017), Volume 5, Issue 11, Page(s): 91–12791
- [5]. Bugwak, E. (2020). Travails of out-of-field teachers: a qualitative inquiry. *Journal of World Englishes and Educational Practices (JWEEP)*. DOI: 10.32996/jweep
- [6]. Brady, A. (2021). Transcription of qualitative data. <https://www.k-international.com/blog/transcription-of-qualitative-data-a-step-by-step-guide-to-transcription-for-academic-research/#:~:text=Put%20simply%2C%20transcription%20for%20academic%20research%20is%20the,text%20format%20for%20the%20purposes%20of%20further%20analysis>
- [7]. Caldis, S. (2017). Teaching out of field: Teachers having to know what they do not know. *Geography Bulletin*, 49(1): 13-17
- [8]. Caldis, S. (2022). Out-of-field teaching: New teachers survive under pressure. <https://researchoutreach.org/articles/out-field-teaching-new-teachers-survive-pressure/>
- [9]. Campanini, M. (2019). The out-of-field teaching phenomenon. <https://publications.ieu.asn.au/2019-september-ie/articles4/teaching-phenomenon>
- [10]. Campbell, C., R. Porsch, R. & Hobbs, L. (2019). “Initial teacher education: roles and possibilities for preparing capable teachers.” in *examining the phenomenon of “teaching out-of-field”: international perspectives on teaching as a non-specialist*, edited by L. Hobbs and G. Törner, 243–267. Singapore: Springer. doi:10.1007/978-981-13-3366-8_10
- [11]. Cavanagh, S. (2011). Personnel costs prove tough to contain. *Education Week*, pp. 26-31. <http://www.edweek.org/ew/articles/2011/01/13/16personnel.h30.html?tkn=XRTF5xExaoNFwryKYzmFZgQwRf1f4tDHZQa8&print=1>
- [12]. Caylao, F. (2015) My Thoughts of Out-of-Field Teaching. <https://federationpress.com.au/product/encouraging-ethics-and-challenging-corruption/>
- [13]. Co, A., Abella, C., & De Jesus, F. (2021). Teaching outside specialization from the perspective of Science teachers. *Open Access Library Journal*, 8: e7725. <https://doi.org/10.4236/oalib.1107725>
- [14]. Craig, C. J. 2016. “Structure of teacher education.” In *International Handbook of Teacher Education*.
- [15]. Du Plessis, D. (2013). Understanding the out-of-field teaching experience. Doctoral Dissertation, University of Queensland. <https://www.google.co.za/search?q=Du+Plessis%2C+D.E.+2013.+Understanding+the+out-of-field+teaching+experience.+&ie=utf-8&oe=utf-8&aq>
- [16]. Du Plessis, A., Carroll, A., & Gillies, R. (2014). Understanding the lived experiences of novice out-of-field teachers in relation to school leadership practices. *Asia Pacific Journal of Teacher Education*. <http://dx.doi.org/10.1080/1359866X.2014.93739>

- [17]. Du Plessis, A. (2015). Effective education: Conceptualising the meaning of out-of-field teaching practices for teachers, teacher quality and school leaders. *International Journal of Educational Research*, 72, 89–102. <https://doi.org/10.1016/j.ijer.2015.05.005>
- [18]. Du Plessis, A. (2019). *Professional support beyond initial teacher education*. Springer Singapore. <https://doi.org/10.1007/978-981-13-9722-6>
- [19]. Gentry, R., Sallie, A., & Sanders, C. (2013). Differentiated instructional strategies to accommodate students with varying needs and learning styles. ERIC. <https://files.eric.ed.gov/fulltext/ED545458.pdf>
- [20]. Hobbs, L. (2012). Teaching out-of-field: Factors shaping identities of secondary science and mathematics. *Teaching Science: The Journal of the Australian Science Teachers Association*, 58(1): 21-29
- [21]. Hobbs, L. (2013). "Teaching 'out-of-field' as a boundary-crossing event: factors shaping teacher identity." *International Journal of Science and Mathematics Education*. doi:10.1007/ s10763-012-9333-4
- [22]. Hobbs, L. (2015). Too many teachers teaching outside their area of expertise. *The conversation*. <http://theconversation.com/toomany-teachers-teaching-outside-their-area-of-expertise-39688>
- [23]. Hobbs, L. (2020). "Learning to teach science out-of-field: a spatial-temporal experience." *Journal of Science Teacher Education*. doi:10.1080/1046560X.2020.1718315
- [24]. Hobbs, L. & Porsch, R. (2021). Teaching out-of-field: challenges for teacher education, *European Journal of Teacher Education*. DOI:10.1080/02619768.2021.1985280
- [25]. Hobbs, L. & Törner, G. (2014). Taking an international perspective on "out-of-field" teaching. *Proceedings and Agenda for Research and Action from the 1st Teaching Across Specializations (TAS) Collective Symposium*. TAS Collective. <https://www.uni-due.de/TAS>
- [26]. Hunter, S. & Springer, M. (2022). Feedback on teacher evaluations misses the mark. <https://www.brookings.edu/blog/brown-center-chalkboard/2022/01/18/feedback-on-teacher-evaluations-misses-the-mark/>
- [27]. Ingersoll, R. (2001). Teacher turnover and teacher shortages: An organizational analysis. University of Pennsylvania. *American Educational Research Journal*, Fall 2001, 38 (3), 499–534
- [28]. Ingersoll, R. (2003). Is there really a teacher shortage? Center for the study of teaching and policy. University of Washington
- [29]. Ingersoll, R. (2005). *The persistent problem of out-of-field teaching*. Lawrence Erlbaum Associates Publisher.
- [30]. Ingersoll, R. (2011). Do we produce enough Mathematics and Science teachers? *Phi delta kappan* 92(6): 37-41.
- [31]. Kathirveloo, P., Puteh, M., & Matematik, F. (2014). Effective teaching: pedagogical content knowledge. *Proceeding of International Joint Seminar Garut, Garut, Indonesia*. https://www.researchgate.net/publication/303940850_Effective_Teaching_Pedagogical_Content_Knowledge
- [32]. (2020). "Berufseinstieg von Lehrpersonen. Herausforderungen, Ressourcen und Angebote der Berufseinführung." *journal für lehrerInnenbildung* 20 (3): 64–73. doi:10.35468/jlb03-2020_06
- [33]. Kelly, M. (2016). Top keys to being a successful teacher. <http://712educators.about.com/od/teachingstrategies/tp/sixkeys.htm>
- [34]. Kenny, J., Hobbs, L., & Whannell, R. (2020). Designing professional development for teachers teaching out-of-field. *Professional development in education*, 46(3), 500-515
- [35]. Kim, E., 2014. Policy change and teaching quality: An analysis of out-of-field teaching realities in upper secondary schools in Korea between 2008 and 2013. *TAS Collective Symposium*. pp: 17-18
- [36]. Kim, I., Ward, P., Sinelnikov, O., Ko, B., Iserbyt, P., Li, W., & Curtner-Smith, M. (2018). The influence of content knowledge on pedagogical content knowledge: An evidence-based practice for physical education. *Journal of Teaching in Physical Education*. <http://files.eric.ed.gov/fulltext/ED526999.pdf>
- [37]. Klassen, R. & Chiu, M. (2010). Effects on teachers self-efficacy and job satisfaction: Teacher gender, years of experience, and job stress. *Journal of Educational Psychology*, 102, 741–756. <https://doi.org/10.1037/a0019237>
- [38]. Luft, J., Weeks, C., Hill, K., and Raven, S. (2013). *Science teacher knowledge: The impact of in- and out-of-field instruction*. San Francisco, CA: American Educational Research Association
- [39]. Mea, N., Pacaña, S., Ramos, C., Catarata, M., & Inocian, R. (2019). Out-of-field social studies teaching through sustainable culture-based pedagogy: a Filipino perspective. *International Journal of Science Education*, 7, 230-341. 10.18488/journal.61.2019.73.230.241
- [40]. Mizell, H. (2010). Why professional development matters. ERIC. <https://eric.ed.gov/?id=ED521618>
- [41]. Mizzi, D. (2013). The challenges faced by science teachers when teaching outside their specific science specialism. *Acta Didactica Napocensia*, 6(4), 1–6. <https://eric.ed.gov/?id=EJ1053677>
- [42]. Napier, J., Luft, J., & Singh, H. (2020). In the classrooms of newly hired secondary science teachers: The consequences of teaching in-field or out-of-field. *Journal of Science Teacher Education*, 31(7), 802-820

- [43]. National Board for Professional Teaching Standards (NBPTS). (2017). National board standards. <https://www.nbpts.org/standards-five-core-propositions/>
- [44]. Ndethiu, Sophia. (2019). Effective classroom communication. 10.13140/RG.2.2.28044.05760
- [45]. Nuangchalerm, P. (2020). TPACK in ASEAN perspectives: Case study on Thai pre-service teacher. *International Journal of Evaluation and Research in Education*, 9(4), 993-999
- [46]. Panisoara, I. Duta, N., Panisoara, G. & Tomoai, E. (2014). Teacher profile in Romania: defining features and priorities of the training programs in teaching career. *Procedia -Social and Behavioral Sciences*, 140, 396-400
- [47]. Ponsaran, C. (2017). Changing shifts, changing tasks: How flexible are Filipino outsourcing staff?. *Philippines: Rethink Staffing, Blog, Ilo-ilo*. pp: 1
- [48]. Porsch, R. 2020. "Fachfremdes unterrichten in deutschland: welche rolle spielt die lehrerbildung?" In *Professionelles Handeln im fachfremd erteilten Mathematikunterricht: Empirische Befunde und Fortbildungskonzepte*, edited by R. Porsch and B. Rösken-Winter, 29–47. Wiesbaden: Springer Spektrum. doi:https://doi.org/10.1007/978-3-658-27293-7_2
- [49]. Porsch, R. & Wendt, H. (2015). Social and science education by primary school teachers who majored in Biology versus a different subject. *ECER Conference*
- [50]. Price, A. (2015). An international perspective on teaching across specializations. Australia: Murdoch University
- [51]. Ramli, A., Ibrahim, N., Surif, J., Bunyamin, M., Jamaluddin, R., & Abdullah, N. (2017). Teachers' readiness in teaching stem education. *Man in India*, 97(13), 343-350
- [52]. Recede, R., Asignado, R., & Castro, M. (2023). Out-of-field teaching: impact on teachers' self-efficacy and motivation. *International Journal of Multidisciplinary: Applied Business and Education Research*. 4. 519-533. 10.11594/ijmaber.04.02.19
- [53]. Salleh, M. & Kalsum, U. (2014). An investigation into differences between out-of-field and in-field history teachers' influence on students' learning experiences in Malaysian secondary schools. <https://digital.library.adelaide.edu.au/dspace/bitstream/2440/85038/8/02whole.pdf>
- [54]. Salleh, U. & Darmawan, I. (2013). Differences between in-field and out-of-field history teachers influence on students learning experience in Malaysian secondary schools. *Creative Education*, 4(9), 5-9
- [55]. Sambe, M. (2015). Out-of-field teaching - consequences of teachers: Teaching out of their field of study. <https://www.tapmagonline.com/tap/out-of-field-teaching-by-mariam-sambe>
- [56]. Sharplin, E. (2014). Reconceptualising out-of-field teaching: Experiences of rural teachers in Western Australia. *Educational Research*, 56(1): 97-110. Available at: <https://doi.org/10.1080/00131881.2013.874160>
- [57]. Tomlinson, C. (2023). What no one told me about "classroom management" as a new teacher. https://www.ascd.org/blogs/what-no-one-told-me-about-classroom-management-as-a-newteacher?_hsenc=p2ANqtz-_vfkHAvYKGT8PBBv8xLsMC0bkr6Gq2BCmZm7NVDU9EciH4tHbHfP6wsnzINGLwbNTSm6auzecRs4SuFEE2MJNPIzsNwR758Wa5joA1GMtQbzmjT8&_hsmi=249528039
- [58]. Pillay, H., Goddard, R., & Wilss, L. (2005). Well-being, burnout and competence: Implications for teachers. *Australian Journal of Teacher Education*, 30(2): n2. Available at: <https://doi.org/10.14221/ajte.2005v30n2.3>
- [59]. & Swail, W. S. (2000). *Certification and teacher preparation in the United States*. Washington DC: Pacific Resources for Education and Learning
- [60]. Sari, T. & Nayir, F. (2020). Challenges in Distance Education During the (Covid-19) Pandemic Period. *Qualitative Research in Education*. 9. 328-360. 10.17583/qre.2020
- [61]. Villena, M. & de Mesa, M. (2015). Teaching styles of the classroom managers in one basic primary school in the Philippines. *Asia Pacific Journal of Multidisciplinary Research*, 3(2), 113–119. <http://www.apjmr.com/wp-content/uploads/2015/06/APJMR-2015-3-2-016-Teaching-Styles-of-the-Classroom-Managers-in-Pinamucan-Elementary-School.pdf>
- [62]. Weimer, N. (2009). Different sources of power that affect the teacher-student relationship. <https://www.facultyfocus.com/articles/teaching-and-learning/different-sources-of-power-that-affect-the-teacher-student-relationship/>
- [63]. Zhou, Y. (2012). *Out-of-field teaching: a cross-national study on teacher labor market and teacher quality*. Michigan State University