[UNIVERSITY OF EDUCATION, WINNEBA

PERCEPTION OF TEACHERS ON THE IMPLEMENTATION OF INCLUSIVE EDUCATION IN THE KWAHU EAST DISTRICT OF THE EASTERN REGION

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DECLARATION

Student's Declaration

I Felix Kudzo Mawuena, declare that the thesis with the exception of question and references contained in published works, which have been identified and acknowledge is wholly my own original work and it has not submitted either in part or whole, for another work elsewhere.

Signature:……..…….. Date……...

Supervisor's Declaration

I hereby declare that the preparation and presentation of this thesis was supervised in accordance with guidelines and supervising of the thesis laid down by the University of Education, Winneba.

Supervisor's Name: Dr. Awini Adam

Signature……..

Date……...

DEDICATION

To my wife and children

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I am grateful to my supervisor Dr. Awini Adam of the Department of Special Education, for painstaking going through every part of this work to make it a successful and also helped shape my work. I also appreciate the efforts of all my lecturers of the Department of Special Education, University of Education, Winneba who guided me throughout my graduate programme.

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ABSTRACT

The study investigated the perception of teachers on the implementation of inclusive education in the Kwahu East District of the Eastern Region. The quantitative approach using a descriptive survey was employed for the study. The sample for the study was 200 teachers from 25 basic schools in the district. The 25 basic schools were chosen using the simple random technique whilst census technique was used to sample the participants from the selected schools. The SPSS software version 23.0 was used to assist in the data analysis. The study showed that teachers had a positive attitude towards learners with disabilities in the classrooms; however, the environment was not facilitating their full participation. The study further indicated that teachers were only ready to include learners with mild disabilities in their classrooms. It was again revealed that there are inadequate material resources to make inclusion a reality. The study further showed that teachers had little knowledge in curriculum adaptations to meet the needs of learners with disabilities. It was recommended among other things that Ghana Education Service (GES) should organize in-service training for teachers on curriculum adaptations. It was again suggested that GES provides more special educators to the district to support the efforts of the teachers.

CHAPTER ONE

INTRODUCTION

1.0 Background to the Study

Inclusive education has been internationally recognized as an educational philosophy promulgated to attain equity, justice and quality education for all children, especially those who have been traditionally excluded from mainstream education for reasons mainly of disability and other discriminating characteristics such as race, gender, etc. (Nguyet, 2010). Inclusive schools must recognize and respond to the diverse needs of students by accommodating both different styles and rates of learning (Nguyet, 2010). Inclusive schools must also ensure quality education for all through appropriate curricula, organizational arrangements, teaching strategies, resource use and partnerships with their communities. There should be a continuum of support and services to match the continuum of special needs encountered in every school (UNESCO, 1994). The UNESCO International Conference in Geneva in 2008 further raised the importance of inclusive education as a means of addressing increasing inequality, spatial segmentation and cultural fragmentation (Boakye-Amponsah, 2015).

Mastropieri and Scruggs (2001) defined the term inclusion as the act of belonging, or being rightly placed within a group of people and having the rights and qualities that characterize members of that particular group. Based on this perception, Foreman (2011) conceptualized inclusive education based on the notion that schools should, without question, provide for the needs of all the children in their communities, whatever the level of their ability or disability. The concept of inclusive education assumes that the mainstream classes can be restructured and adapted so that the needs of children with special needs can be met. This orientation towards inclusion was part

of the important agenda in the conference in Spain in 1994 which brought forward the Salamanca Statement on Principles, Policy and Practice in Special Needs Education.

Avramidis and Norwich (2002), suggested that, in order to shift towards inclusion, more importance on individual learning needs compared to categorical needs based on diagnosis is required, thus reflecting the ideological shift from the individual to the social model. Inclusive education is based on the social model of disability that recognizes the diversity of learners' abilities and needs. This education model tries to balance the needs for social inclusion and equality with the objective to go beyond skill acquisition in order to address belief systems which support active learning (Miles & Singal, 2010). It aims to provide opportunities for all children to receive a quality education, regardless of their unique learning needs and circumstances. Although children with disabilities may have some similarities, they have individual traits as do all children which highlights that they are not a homogenous group who behave according to their labels (Miles & Singal, 2010). Through the lens of the social model of disability, an individual's abilities within the classroom environment should be secondary compared to the issue of flexibility in pedagogy and accessibility of the curriculum to address these unique needs (Florian, 2008; Polat, 2011).

However, in reality children's learning needs are often closely tied to the impact of their impairment instead of the accommodations of the learning environment (Bines & Lei, 2011). Similar to the tenets of the social model of disability, the person-environment relationship is embedded within the Salamanca Statement to make consideration of the cultural, social, and environmental contexts (Michailakis & Reich, 2009). The Salamanca Statement (UNESCO, 1994) states that inclusive schools deemed 'schools for all' are to "include everybody, celebrate differences, support learning, and respond to individual needs" (p. iii). It highlights the importance of

educating all children, regardless of their conditions (e.g., social, emotional, linguistic, physical, and intellectual) within the same classroom, not just the same school (Bines & Lei, 2011).

Miles and Singal (2010) concurred that inclusive education is a comprehensive process that involves supporting diversity of the learners and fostering their individual growth by addressing school policies, practice, and culture. This suggests that inclusivity in education is not merely about access to education, but a principle built on equity that aims to provide children with opportunities for meaningful learning and participation (Florian, 2008). The intent is that all students will access an appropriately challenging and flexible curriculum with necessary supports to meet individual learning needs. Therefore, the education system is adapted to fit the learning needs of its learners, instead of the learners needing to fit the system or be excluded from it (Ahsan & Mullick, 2013; Chhabra, Srivastava, & Srivastava, 2010).

Adapting the system, philosophy and policy of education to fit the learning needs of all manner of learners, with or without disabilities requires the active participation of the teacher, being the actual implementer of such policy at the classroom level. It is a common knowledge that teachers' perception of inclusive policies will not only determine their acceptance of inclusive policies, but will also affect their commitment to implement such policies (Avramids & Norwich, 2002). Furthermore, teachers' perception or attitudes towards leaners with specific needs appear to influence the type and quality of teacher-learner interactions, directly impacting on the learners' educational experiences and opportunities. Furthermore, Cross, Traub, Hutter-Pishgahi and Shelton (2004) pointed out that one of the important conditions needed for successful inclusion of children with special education needs is the positive perspective of school staff who work with these children. On the other hand, the negative

perspective of these professionals could be the main factor that impedes the process of inclusion of children with special education needs in the regular classrooms.

In Ghana, Deku and Vanderpuye (2008) observed that physical environments are not contributing enough to enable classroom teachers to facilitate the education of children in general and the education of children with special education needs, in particular. One cannot deny the fact that the general physical environments of many schools, especially those in the rural areas, leave much to be desired. The implication is that the promotion of good teaching and learning in such unattractive environments would be negated. Inclusive education is likely to succeed in welcoming and attractive environments.

Studies have established that the physical conditions of the environment including teaching spaces, seating, furnishings, spatial density, privacy, noise and acoustics, climate and thermal control, air quality and windowless classrooms impinge on students' attitude to school, engagement, achievement and general wellbeing (Higgins, Hall, Wall, Woolner, & Mccaughey, 2005; Lackney & Jacobs, 2002). It is perceived that being in a good physical environment is important for children with disabilities as well as all other children, as good school environments enhance positive identity formation (Agbenyega, 2008). It is further perceived that provisions of accommodations, through a child-centered pedagogies, are recommended for children with disabilities to access the curriculum. Miles and Singal (2010), posit that children with profound disabilities should attend special schools for their needs to be adequately met. (DeBoer, Pijl & Minnaert, 2010), supports this view that not all children can be appropriately placed in an inclusive classroom and recognizes that there are limits to inclusion in practice. They further argue that pedagogical practice may not be universally effective for all children and that exclusion of some children is required for

the benefit of the class. Additionally, teachers may demonstrate negative attitudes depending on the child's behavioral or functional challenges (DeBoer et al., 2010).

Avramidis and Norwich (2002), emphasise that the classroom needs to be colourful and interesting for learners to feel enthusiastic about coming to school. Material resources such as textbooks, charts, maps, audiovisual and electronic instructional materials such as radio, tape recorder, television and video tape recorder among others facilitate the implementation of the inclusive education as every learner has the opportunity to enhance his/her cognitive skills. Avramidis and Norwich (2002), contend that teachers' perceptions and attitudes could become more positive if more teaching and learning resources and pedagogical supports are provided.

The elements of adapting the curriculum, appropriateness of teaching and learning environment, provision of teaching and learning resources and nature of socialisation have the potential to impact significantly on the implementation of the inclusive education programme in Ghana (Deku & Vanderpuye, 2008). Teachers' perception on these elements can influence their attitude towards implementation of inclusive education. This calls for the need to understand the beliefs, perceptions, knowledge and concerns teachers may have about implementation of inclusive education in terms of these elements.

1.1 Statement of the Problem

The pace of implementation of inclusive education in Ghanaian basic schools has been slow despite the government's signing of international treaties (e.g., UNESCO Salamanca Statement, 1994) and formulating national legislations aimed at promoting inclusivity especially at the basic educational institutions in Ghana. The pace of

implementation of inclusive education is slow due to the provisional constraints of adequate facilities, support services, classroom materials, and staff training.

The researcher's informal interaction with some of the teachers in Kwahu-East District disabilities as accessibility and friendliness is becoming more difficult for learners with disabilities. Again, the learning experiences learners are exposed to are skewed towards learners without disabilities as the content, pedagogical approaches and assessment favoured such learners. This could suggest that, teachers may have difficulties in adapting the general curriculum to suit diverse learning needs of children. As a result of these practices in basic schools, some of the special need learners appeared to feel uncomfortable and thus, turn to be truant and finally, drop out of school (Deku & Vandapuye, 2008). These practices are negatively affecting the implementation of inclusive education in the Kwahu-East District.

1.2 Purpose of the Study

This study investigated the perception of teachers on the implementation of inclusive education in the Kwahu East District of the Eastern region of Ghana.

1.3 Research Objectives

The following research objectives guided the study:

1. To determine the perceptions of teachers towards the inclusion of learners with disabilities in inclusive classrooms in the Kwahu East District.
2. To find out the perception of teachers in adapting the curriculum to meet the needs of diverse learners in inclusive schools in the Kwahu East District.
3. To find out the views of teachers on the appropriateness of the learning environment for all learners in the district.
4. To explore the challenges teachers face in teaching children with disabilities in inclusive schools in the Kwahu East District.

1.4 Research Questions

The study was guided by the following research questions:

1. What are the teachers' perception towards the inclusion of learners with disabilities in inclusive classrooms in Kwahu East District?

2. What are the perceptions of teachers on the adaptation of the curriculum to meet the needs of diverse learners in inclusive schools?

3. What are the views of teachers on the appropriateness of the learning environment in the implementation of inclusive education in inclusive schools in the District?

4. What challenges do teachers face in teaching children with disabilities in inclusive schools in Kwahu East District?

1.5 Significance of the Study

The outcome of this study would help in finding out the perceptions teachers have towards the adaptation of the curriculum to meet the needs of diverse learners in inclusive schools in the Kwahu East District. This would enable the authorities of the schools to help find how teachers' perceptions reflect on their acceptance of inclusive education in the District. In addition, the findings of the study would help in revealing how factors such as adaptation of curriculum, appropriateness of the learning environment, provision of teaching and learning resources will meet the needs of learners with diverse needs. Besides, researchers interested in inclusive education will use the findings of the study as a springboard for further research on teachers' perceptions towards inclusive education in Ghana. Finally, it is hoped that the results from this study would add to the existing literature concerning teachers' perception and preparedness towards inclusive education.

1.6 Delimitation of the Study

This study examined the perception of basic school teachers about their ability to implement inclusive education in Kwahu East District. Specifically, the scope of the study included perception of teachers on adaptation of the curriculum to meet the needs of diverse learners in inclusive schools, views of teachers on the appropriateness of the environment in the implementation of inclusive education in inclusive schools, and the needs of teachers on the nature of socialization existing between those with and without special needs in their schools.

1.7 Organisation of the Study

The study was organized into six chapters. Chapter One covered the background to the study, statement of the problem, purpose of the study, objectives of the study, research questions, significance of the study, delimitation and definition of key terms. Chapter Two reviewed relevant related literature as well as the theoretical and conceptual framework of the study. Chapter Three covered the research methodology whilst Chapter Four focused on the presentation of results whilst Chapter five focused on the discussion of the data gathered. Finally, Chapter six covers the summary of the findings, conclusions, recommendations and suggestions for further study.

CHAPTER TWO

REVIEW OF RELATED LITERATURE

2.0 Overview

This chapter presents the literature reviewed for the study. The review first covers the theoretical framework followed by a review on the key themes raised in the research questions. These are:

- Theoretical framework
- The concept of inclusion
- Teachers' perceptions towards the inclusion of learners with disabilities
- Teachers' perceptions on curriculum adaptation and learner diversity
- Teachers' views on inclusive learning environment
- Challenges teachers face in teaching learners with disabilities

2.1 Theoretical Framework

Bandura's self-efficacy theory originates from social cognitive theory (Bandura, 1977). The theory evolved when Bandura became aware that there was a missing element in social learning theory. According to Bandura (1977), self-efficacy beliefs are fundamental to human functioning. Artino (2006) posits that a person must possess the necessary knowledge and skills, as well as the motivation and perception, required for successful exhibition of the required behaviour under difficult circumstances. Bandura (1977), theorised that perceived self-efficacy makes a difference in how people think, feel, and behave. His theory states that people faced with constant rejection must possess high self-efficacy, or self-worth, in order to persist. His theory further states that self-efficacy is based on one's judgment of one's capacity to execute a given responsibility (Skaalvik & Skaalvik, 2007). It is important to note that people's beliefs in their efficacy can have diverse effects. Johnson (2010) argues that these beliefs

influence the courses of action people choose to pursue, how much effort they put forth in given endeavors, how long they will persevere in the face of obstacles and failures, their resilience to adversity, whether their thought patterns are self-hindering or self-aiding.

Educational research has examined the truth in the correlation where one's efficacy beliefs dictate performance and performance determines outcome (Bandura, 1997). According to Bandura (1997), self-efficacy is the belief in one's capabilities to organize and execute the courses of action required to manage prospective situations. These beliefs affect behaviours and ultimately performance outcomes (Bandura, 1977). Bandura (1977) described four sources of self-efficacy: mastery experiences, vicarious experiences, verbal persuasion, and physiological and affective responses. Bandura (1982, 1986) maintained that mastery experiences (performance accomplishments) are the most effective way to develop a strong sense of efficacy. Successful performances serve as positive examples that may shape perceptions about future capability to perform the same or a similar task again (Bandura, 1977). This positive shaping of perceptions is what Bandura considered improving self-efficacy. On the other hand, failing at a task can weaken self-efficacy by serving as a negative past performance that may negatively shape perceptions about capability (Bandura, 1977).

Another way to develop self-efficacy is through vicarious experiences, which are generated through social models (Bandura, 1977). Bandura and Barab (1973) noted that observing others perform intimidating responses without adverse consequences can reduce fears and inhibitions, thus motivating action. As a result, people who observe others performing intimidating responses without adverse consequences are more apt to believe their attempts at the same action would be successful. A third way to develop self-efficacy is through verbal persuasion, commonly used to influence behaviour

because it is easy to use and readily accessible (Bandura, 1977). Through other people's suggestions, people are prompted to believe that they have the capability to accomplish a task that they previously felt ill-equipped to accomplish (Bandura, 1977). However, verbal persuasion alone will not prompt effective performance; people also must receive the appropriate tools needed to perform a given task (Bandura, 1977).

The last way to develop self-efficacy is through physiological and affective states. Bandura (1997) suggested that one's physical and mental states can impact one's perception about performance, thus affecting self-efficacy and ultimately performance outcomes. Emotional arousal to stressful situations may promote fear and anxiety, which negatively influences performance (Bandura, 1977). In a reciprocal manner, those negative performance outcomes affect a person's physiological and affective states (Bandura, 1977). In addition to the four sources of self-efficacy Bandura also distinguished between efficacy expectation and outcome expectation. An outcome expectation is a person's estimate that a given behaviour will lead to certain outcomes. An efficacy expectation is the conviction that one can successfully execute the behaviour required to produce the outcomes (Bandura, 1977). Thus, a person can believe that a certain behaviour will have a certain outcome, but if the person seriously doubts his or her ability to be successful performing the activity, outcome expectancy will not influence his or her behavior (Bandura, 1977). This is particularly applicable to verbal persuasion, which will not be successful in influencing behaviour unless a person's efficacy expectations match his or her outcome expectations.

Tschannen-Moran et al. (1998) notes that Bandura's self-efficacy theory is one of the few conceptualizations of human control that describe a distinction between competence and contingence. These theoretical connections between one's perception

of teacher efficacy and one's organizational commitment are relevant in investigating the problem of practice since they highlight a cognitive link in dissatisfaction-quit sequence (Hom & Kinicki, 2001). Because a teacher's affective reaction to work and subsequent feelings of commitment are major theme in attrition (Billingsley, 2004), and the dissatisfaction-quit sequence (Hom & Kinicki, 2001), developing practical insight into the thought process preceding actions, such as lack of commitment, can support the development of effective teacher commitment. Perceived self-efficacy refers to beliefs in one's capabilities to organize and execute the course of action required to produce given attainment (Bandura, 1997).

Once people develop a perception of a given situation, their expectation of that situation is processed into a given behaviour that leads to an outcome. Bandura (1997) continues to note that an outcome expectation is defined as one's estimate that a given action will lead to a desired outcome. This means that how a person feels about a circumstance will determine not only the behaviour, but also the outcome, once a person evaluates what kind of outcome to expect. One's perceived self-efficacy and the subsequent expectations about a given situation determine how much effort to put forth and how long to persist in challenging situations.

Bandura (1999) further argues that one's perceived self-efficacy, or one's sense of control of an environment and behavior, will determine the amount of effort, if any, to put forth and how long to persist through challenges and negative experiences. The reason why Bandura's (1977) theory of self-efficacy was relevant for this study was on the main assumption that people's beliefs in their efficacy have varied effects on behavior such as commitment. A person's efficacy beliefs influence their course of action, efforts toward a given goal, how long they will persevere through adverse

situations, levels of stress and depression in coping with some external demands, and the level of success they are able to attain.

2.2 The Concept of Inclusive Education

Inclusion is the provision of services to children with disabilities including those with severe impairments in the neighborhood school in age appropriate general education class with the necessary support services and supplementary aids to ensure child's success- academic, behavioural and social, and to prepare the child to participate as a full and contributing member of the society. Inclusive education is used to describe educational policies that uphold the rights of students with disabilities to belong within mainstream education. Lewis and Doorlag (1995), on other hand, postulate that inclusion is sometimes used to describe the mainstreaming process, and they highlight that the advocates of full inclusion maintain that the general education classroom is the most appropriate fulltime placement for all students with disabilities including those with severe disabilities. They further postulate that support, in this model, is provided within the regular classroom setting.

They are also aware that other special education professionals do not concur with the assumption that full-time inclusion is the appropriate placement for students with disabilities. Their strong contention is that professionals who are opposed to full-time inclusion advocate that other options, like resource rooms, should be available so that educational programmes could be tailored down to the specific needs of individual students. Inclusion, in their view, tend to be biased towards students with disabilities that negatively affect their school performance and they are of the view that that the concept should be expanded to include other groups whose learning needs are more important in such a way that they warrant special consideration. In their illustration, for

instance, they included gifted and talented students from culturally and linguistically diverse backgrounds and students at risk for school failure that have special needs that could be accommodated within the regular classroom. They are also of the opinion that special students differ, some may learn faster and easily while others may learn with difficulty. Another important issue they highlight is that students' behaviour may be beyond reproach and frequently inappropriate, while others may have problems steming from their speech, language or culture.

Among all the factors that account for the growth and development of education is significantly and indisputably the teacher factor (Sharma, Forlin, Guang-xue, & Deppeler 2013). Hence, no country can afford to neglect the education and training of teachers. The quality and standard of education provided will primarily depend on the quality of teachers. The existing patterns and programmes of teacher training follow the traditional teacher education with emphasis on teaching general education students and little regard for inclusive pedagogy. Sharma et al. (2013) espoused that quality teacher training should be available before and during the implementation of an inclusive programme.

This training should be grounded in sound inclusive pedagogy. Education of children with Special Educational Needs (SEN) in inclusive settings is an emerging venture involving several challenges. The range and complexity of changes taking place in the field of special education implies that there should be a transformation of teacher training curricular to include materials and methods that are relevant to meet the challenges of inclusive education. Teachers' knowledge, emotions and skills about inclusive education are particularly important in the successful implementation of the inclusive education programme (UNESCO, 1994). Over the past decades, inclusive

education approaches have been proposed and accepted for the education of children with Special Educational Needs (SEN).

The move towards inclusive education has been promoted as a reaction to segregated schooling, against children with SEN (UNESCO, 1994). The argument for inclusive education is that it largely hinged on human rights as well as social issues. Inclusive education more generally, has dominated public policy and social discourse and this is an attempt to make education more meaningful and accessible to children with SEN, who otherwise, would not benefit from the regular school programme. Inclusive education can therefore be conceptualised as good education for everyone and the best way to educate children with SEN (Ainscow, 2013; Deppeler, 2012).

The concept of inclusive educational programming is based on the premise that children of exceptional abilities and backgrounds benefit both academically and socially in a learning environment where they are served alongside normally achieving learners as opposed to being segregated from them. In this regard they defined the full inclusion programme as a model of service delivery characterized by six criteria: All students attend schools to which they would go if they had no disability; A natural proportion of learners with disabilities occurs at each school site; A zero rejection philosophy exists so that typically no student would be excluded on the basis of type and extent of disability; School and general education placement are age and grade appropriate with no self-contained special education classes operative at school site; Cooperative learning and peer instructional methods receive significant use in general instructional practice; Special education supports are provided within the context of the general education class.

Inclusive education is about educating all children so that they reach their potential (UNESCO, 1994). Although the physical location of students in schools and classrooms is not about where children sit as much as about how adults and classmates welcome all children to access learning and recognize that the diversity of learners in today's schools dictates that no single approach is appropriate for all. Inclusive education is based on the principle that the school should accommodate all children regardless of their physical, intellectual, social, emotional linguistic and other conditions (Friend, 2008).

To guide the practice of inclusive education in Ghana, the Government developed a policy to guide its operation (Ministry of Education, 2015). Another initiative taken by the Government of Ghana was to pass a disability law (Act 715), which made provisions for inclusive education (Republic of Ghana, 2006). Notwithstanding this, the Special Education Division of the Ghana Education Service (GES) also developed a policy on special education in 2005 based on the key policy objectives of the Education Strategic Plan - 2003 (Ministry of Education, Science and Sports, 2003). The special education policy seeks to address the challenges of marginalisation, segregation, and inequality that have constituted barriers to inclusion of persons with disabilities into mainstream activities.

The follow up to these initiatives by the education authorities was the initial national support programmes including series of workshops for teachers, supervisors including the blind instructors as well as courses in sign language (Deku & Mensah, 2004). The Ministry of Education also adopted a 'training-the-trainer approach' whereby teachers who received the initial training were required to train other teachers in inclusive education approaches (Deku & Mensah, 2004). A resource team of eight resource

teachers was set up to provide subsequent training for resource teachers appointed and new teachers in the districts where the initial inclusive programme began. Again, more resource teachers were employed and posted to the district education offices. For example, in 1999, there were only 65 resource teachers, in 2000 the number increased by 12.3% and in 2001, the Ghana Education service recorded 40% increase (Deku & Mensah 2004). It is noteworthy that a number of UNESCO Resource Pack for teachers on inclusive education was printed and distributed to teachers in four regions. This set the stage for the implementation of the pilot schools in 2003.

From the initial 35 inclusive schools in 10 districts that began on a pilot basis, by the close of 2011 the number of pilot inclusive schools in the country increased to 529 in 34 districts (Ministry of Education, 2015). Since 2012, UNICEF in collaboration with The Ministry of Education implemented inclusive education in 14 additional districts. All the 2,493 schools in these districts are practicing inclusive education (Deku & Vanderpuye, 2017). As a result of this, currently there are 3,022 inclusive schools in 48 out of the 216 districts in Ghana. In Ghana, five types of inclusive programmes exist. These are:

- Units for children with intellectual disability within regular education complexes.
- Integrated educational Programme for children with low vision.
- Hostel Support, Units for the blind in schools for the deaf
- Inclusive schools with special resource teacher support and
- Inclusive schools without resource teacher support.

Based on a quality perspective, inclusion is perceived as a more accurate way of describing the quality of education offered to students with special needs within an

integrated setting. He argued that to be regarded as fully included, learners with special needs should take a full and active part in the life of the mainstream school and they need to be valued as members of the community and be perceived as internal part the school. The frame of equality, according to Leeman and Volman (2001), is about a genuine commitment to inclusion which includes among other things, changing culture of the institution to make it more responsive to differences, receptive to change and sensitive to language imagery and the presentation of ideas. They further assert that inclusion is about creating culture which welcomes supports and nurtures diverse needs as well as accepting people as they are, not expecting them to struggle to be normal.

Research suggests that, given the necessary legislation and resources, teachers play a pivotal role in the effective implementation of inclusion (SaponShevin, 1996). It is therefore important to study teachers' views on inclusive schools. In support of this idea, it is argued that a clear distinctions between comprehensive and coherent inclusive practices and partial fragmented efforts must be made. Many initiatives that are implemented under the guise of inclusion are based on faulty conceptions of ability and disability and outmoded special education practices. From this perspective, it is imperative to make a critical appraisal of the inclusive programme in Ghana.

Avramidis and Norwich (2002) opined that teachers' perceptions are important to successful implementations of inclusive education. Furthermore, Cross et al. (2004) pointed out that one of the important conditions needed for successful inclusion of children with SEN is the positive perspective of school staff members who work with these children. On the other hand, the negative perspective of these professionals could be the main factor that impedes the process of inclusion of children with SEN in the regular classrooms.

Many studies have been done on inclusion. Reviews of these studies have highlighted child outcomes, classroom practice variables, teachers and family belief systems, social and educational policy implications (Buysse & Bailey, 1993; Lamorey & Bricker, 1993; Odom & Diamond, 1998; Pearce, 2009). Similarly, much of the professional literature on inclusion has focused on the importance of the beliefs and perceptions of both special and regular education teachers (Vidovich & Lombard, 1998; Wigle & Wicox, 1997) and on recommended practices that are seen as essential to making inclusion work (Blenk & Fine, 1995). The elements of teacher preparation, the curriculum and the physical environments therefore have the potential to impact significantly on the implementation of the inclusive education programme in Ghana. Although these studies stressed the importance of investigating teachers' perceptions, few studies have explored teachers' perspectives on the curriculum, the physical environment and teacher preparation in Ghana. In recent years, it appears that the desire to measure and improve the quality of inclusive education practices has been impeded by the need to provide a common understanding of what is meant by inclusive education. Although the practice of inclusive education is known to be broad, it however depends on the perspective of the individual.

Inclusive education is an educational reform programme, and not an advocacy of good school/classroom practice. The eventual purpose of the reform is supposed to be the reorganization and restructuring of educational system (Armstrong & Barton, 2007). The authors also point out the need to see the interconnection between inclusive education and the wider variety of issues such as social and economic goal of education. Lorella Terzi (2008) sees inclusive education as primarily political. Based on Terzi's argument, the political dimension of inclusive education arises from two major points, namely: from its determination to avoid exclusionary policies and practices; and from

its political convergence with the social model of disability and the political struggle and movement of people with disabilities. She also asserts that inclusive education could be political because it tries to take care of all citizens in a participatory democracy.

Inclusive education is considered a means to an end (Armstrong & Barton, 2007). For them, it is the fundamental instrument which contributes to the realization of an inclusive society. The demand of inclusion is essentially the issue of human right, equity, social justice, and the fight for non- segregating society. That is why these values and notions are the hubs of inclusive educational policy and practice. There have been also endeavors in framing the meaning of inclusive education in terms of the developed world and the developing world. One such attempt is meaning given by Armstrong and Barton (2007). According to these authors, the idea of inclusive education in the developed world was an immediate challenge to the customary view and role of special education. The initiative is said to be pushed substantially by the movement of people with disability in the UK, USA, and other parts of Europe.

Several researchers have suggested that the concept of inclusive education is more involved than providing education for all children within the classroom, and is related to the much larger concept of social inclusion and valued status for all people in society irrespective of differences or disability (Forbes, 2007; Forlin, 2006; Mastropieri & Scruggs, 2001; Thomazet, 2009; Zoniou-Sideri & Vlachou, 2006). It has also been suggested that an inclusive approach to education is beneficial for all children, and the rewards of an inclusive environment are not limited to children with special education needs (Nind & Wearmouth, 2006). This then points to the fact that with inclusion, all

teachers in schools will be involved hence knowing their perceptions towards inclusive education will be important hence the relevance of this study.

Inclusion has academic and social benefits for both students with and without disabilities and their teachers and families as well (Grenot-Scheyer, Jubala, Bishop & Coots, 1996). This entails increased communication and social interaction opportunities, age appropriate models of behaviour skills, more active participation in the life of school community, individualized education goals as well as access to the rich core curriculum. Grenot-Scheyer et al. (1996) continue to note that the inclusive model of education requires the establishment of a collaborative ethic as well as shared ownership of all students. They maintain that through collaborative team effort, specialised support can follow learners to general education classrooms and allow all learners to develop and learn. For them such kind of support may include assistance from a specialist to adapt activities from the core curriculum to meet the individual needs of the diverse learners in the general education classroom.

Inclusion therefore, should be regarded as a shared responsibility for both generalist and specialist teachers in providing a full continuum of services delivery options to all students with special educational needs within the school context as well as responding to diversity and being open to new ideas, empowering all members of community and celebrating differences in a dignified way (Carrington, 1999). Carrington (1999) identified four factors that are embodying inclusive education. These factors are: Nondiscriminatory education in terms of disability, culture and gender; Involvement of all students in a community with no expectations; Equal rights for students to access culturally valued curriculum as full-time members of age appropriate regular classroom; Emphasis on diversity rather than assimilation.

The origin of inclusive education can be traced back as far as 1960s when the struggle for civil rights and equity for emancipation was taking place in several countries of the world. The early attempts for inclusion and inclusive education are believed to have originated in diverse groups who have diverse practices and diverse understandings (Armstrong et al, 2010). The collective effort in critiquing the then existing and emerging issues of education is believed to have helped in shaping the conception of inclusion and inclusive education. According to Yeibyo (2012) the critique is said to be noticeable in contexts where mainstreaming and integration were already recognized.

The North America, England, Australia, and Newzealand were some of those contexts mentioned. In the process of the critique, teachers, parents, and advocates of students with disabilities are said to have begun questioning the barriers to access and participation. The explicit international developments including the Jomtien declaration, 1990; the Salamanca Statement, 1994; and the Dakar framework, 2000 are indicators of the effort that was growing across the globe in developing the notions of inclusive education.

2.3 Teachers' Perception towards the Inclusion of Learners with Disabilities

There is a global movement towards inclusive education (Salamanca Statement, UNESCO, 1994), where one system of schooling is provided for all a nation's children regardless of whether or not they exhibit disabilities or other barriers to learning. The Salamanca Statement further highlights the need to provide education for all children in an inclusive school (UNESCO, 1994). As a result, the implementation of inclusive schools has been a goal in many countries (Leyser & Kirk, 2004). Inclusion is based on the concept of social justice; wherein all students are entitled to equal access to all

educational opportunities, irrespective of disability or any form of disadvantage (Organization for Economic Cooperation and Development, 2005).

In Australia, the Commonwealth and State educational governments advocate for the inclusion of children with disabilities within regular classrooms (UNESCO, 1994). Nevertheless advocacy alone does not ensure that the policy is favourably accepted by those on the frontline of implementation, namely, classroom teachers. UNESCO reported about studies that concluded that teacher attitude and expectations are significant barriers to the successful implementation of inclusive classrooms (Avramidis & Norwich, 2002) and equitable participation of all students.

Perceptions are conceptualised as relatively stable constructs comprising cognitive, affective, and behavioural components (Bizer, Barden, & Petty, 2003). Teachers' perceptions towards inclusion are often based on practical concerns about how inclusive education can be implemented, rather than be grounded in any particular ideology (Burke & Sutherland, 2004). Common practical concerns raised by teachers include: accommodating the individualised time demands of students with disability without disadvantaging other students in the classroom; being apprehensive of the quality and quantity of work output of children with disabilities; lacking adequate support services; and limited training and competence in supporting inclusive educational practice (Bender & Scott, 1995).

The severity of the disability that teachers are required to accommodate within their classroom is inversely associated with their perception towards inclusion. That is, the more severe the child's disability; the less positive their perception is towards inclusion (Forlin & Chambers, 2011). The type of disability also appears to influence teachers' perceptions. For example, teachers were found to generally be more supportive of

including children with physical and sensory disabilities than those with intellectual, learning, and behavioural disabilities (Avramidis & Norwich, 2002; Ellins & Porter, 2005).

Inclusive policies are suggested to contribute to a more just and equal society (South African Department of Education, 2001), in part, because they expose children to diversity early in life, making diversity a normal rather than abnormal experience. Equality and human rights have been central themes in the lives of Ghanaians since the establishment of the 1992 Constitution, and educating children of varying races, cultures, genders, and degrees of academic ability together within one classroom may be one way to combat deeply entrenched prejudices that at one time permeated the African society (Agbenyega, 2008).

Broadly, inclusive education is viewed as learners with disabilities learning in the same classroom with their same-age typically developing peers using appropriate supports to facilitate their social and intellectual education. Within Ghana specifically, inclusion is viewed within a human rights approach, ensuring that all learners have the same opportunities to a good education that will help them become productive citizens (Engelbrecht, 2006). Rapid political and policy changes do not always translate into what occurs in practice, however, a reality that is evidenced by the lack of progress in implementing inclusive policy in Ghana over the past decade. About 70% of children of school-going age with disabilities are out of school (Department of Education, 2001) and the vast majority of those attending school are in special schools for learners with disabilities, which are separate from mainstream schools for typically developing learners.

Although various factors contribute to the current state of inclusive education, teachers' attitudes may be one of the most important facilitators since teachers ultimately have the opportunity to implement or stymie educational policy. Teachers' attitudes concerning inclusive education are varied and are influenced by factors at different environmental levels, including learner-level factors, school-level factors, broader cultural-and societal-factors as well as factors related to the teachers themselves (Avramidis, Bayliss & Burden, 2000). The current study seeks to quantitatively determine the perception of Kwahu East teachers towards the inclusion of learners with disabilities in mainstream classrooms. On the teacher-level, for example, research has found that teachers with more education and inclusive training tend to hold more positive attitudes towards learners with disabilities (Avramidis & Kalyva, 2007; Forlin, Lreman, Sharma & Earle, 2009), whereas older teachers tend to hold inclusive attitudes that are more negative (Bornman & Donohue, 2013).

School-level factors such as the resources and provision of supports to teachers also can engender positive or negative attitudes towards the inclusion of learners with disabilities into their classrooms (Avramidis & Norwich, 2002; Lindqvist & Nilholm, 2013). The nature and severity of the learner's disability likewise can influence teachers' attitudes (Avramidis, Bayliss, & Burden, 2000; Avramidis & Kalyva, 2007; Scruggs & Mastropieri, 1996), potentially because the degree of learners' impairments can challenge teachers' self-efficacy and self-confidence in overcoming learners' academic barriers.

Drame and Kamphoff (2014) noted that some African communities marginalised children with disabilities and their parents. The challenges for children with disabilities within Sierra Leone and West Africa continue to pose a threat to a just life for children

with disabilities (Drame & Kamphoff, 2014). In Senegal, Drame and Kamphoff (2014) observed that stereotyping children with disabilities does not end with the family but is also a common practice in the society. As a result, this negative communal stigma regarding the ability and performance of children with disabilities has impeded access to increased social acceptance and positive self-esteem.

In Senegal, parents are afraid for the general wellbeing of their children and are left with little option but to keep them away from public schools and other gatherings (Drame & Kamphoff, 2014). Article 4 of the Convention of the Rights of Persons with Disabilities, the responsibilities of signatories, includes promoting and guaranteeing that the human rights of all persons with disabilities are respected without any form of discrimination or prejudice (United Nations, UN, 2017). Disabilities within the African culture are seen as the result of a curse. The UN (2017) noted that acts of negativity against children with disabilities were the norm rather than the exception. Such negative cultural perceptions were at variance with the parameters set for inclusive educational reforms in some of these communities.

Stone-MacDonald and Butera (2013) added that when a society is unwilling to break with age-old cultural values, expectations, and interpretations, the idea of implementing inclusive education with fidelity would be difficult to achieve. In contrast, the World Bank (2013) report indicated that the world has seen some changes over the last decade, particular from those who have worked with children with disabilities in their classrooms.

Variables affecting Teachers' Perception towards Inclusive Education Policies

Teacher-Level Factors

Teachers are expected to be one of the primary drivers behind inclusive policies because they are the gatekeepers for the classroom climate and activities. Various factors have been found to influence teachers' attitudes towards inclusion, including age, education, and training (Bornman & Donohue, 2013). Current teacher training in Ghana focuses on meeting the needs of a diverse body of learners. Yet, previous training emphasized the distinction between teachers who taught mainstream and special classes, thus teachers were trained to teach typically or atypically developing children, but not both (Bornman & Donohue, 2013). Because of this prior approach of teacher training, many African educators, including Ghanaian educators currently find themselves in a position where they are expected to teach learners with various educational needs and barriers to learning without any relevant experience or training (Oswald, 2007).

In fact, African teachers note that their lack of effective preparation is one of the major stressors about the prospect of inclusive education (Engelbrecht, Oswald, Swart, & Eloff, 2003). In a large study of 2,577 South African primary school teachers, only 36% of teachers could even describe what inclusive education was (Hay, Smit & Paulsen, 2001). Not knowing what to do or how to do it, teachers who lack appropriate inclusive training may quickly become overwhelmed when asked to include a learner with a disability into their mainstream class. Teachers who have been provided with inclusive education training, on the other hand, tend to report more positive attitudes towards inclusion (Avramidis et al., 2000; Subban & Sharma, 2006). In addition to training, mere exposure to individuals with disabilities has been found to facilitate more positive attitudes regarding educational inclusion (Chhabra, Srivastava, & Srivastava, 2010).

Together, these findings suggest that, when provided with appropriate training, experience, and exposure, teachers can become more self-confident and self-efficacious about their abilities to include learners with disabilities into their classes.

School-Level Factors

The provision of supports to teachers can contribute to their attitudes concerning inclusive education (Avramidis & Norwich, 2002), particularly since the academic needs of learners with disabilities can be complex and varied, and beyond what generally is available in a typical Ghanaian classroom (Lomofsky & Lazarus, 2001). School supports can come in various forms and generally should be specialised with consideration towards a learner's particular needs. There are various types of supports, including teacher's aides, smaller class sizes, special equipment, test accommodations for the learner, flexible teaching schedules, and extra non-instructional time to help teachers to adjust their workload (Lomofsky & Lazarus, 2001). Although supports can foster the inclusion of learners with disabilities into mainstream classrooms, research suggests that they rarely are provided to teachers in South Africa (Nel, Muller, & Rheeders, 2011).

Learner-Level Factors

Teachers' attitudes towards inclusion have been found to be influenced by the nature of a learners' disability (Avramidis & Kalyva, 2007), potentially because learners with more severe and multiple disabilities have more complex learning needs, require more significant adaptations to the curricula, and one-on-one instructional time. Research has found, for instance, that teachers rated learners with severe intellectual disabilities, autism, and sensory impairments the most challenging to include within a mainstream classroom (Avramidis & Kalyva, 2007). Teachers within South Africa and Lesotho have reported that including learners with intellectual disabilities into their classrooms

is particularly difficult (Engelbrecht, Oswald, & Forlin, 2006; Johnstone & Chapman, 2009), whereas South African teachers have reported that including children with physical disabilities caused little stress (Eloff, Swart, & Engelbrecht, 2002).

Teachers' Academic Expectations for Learners with Disabilities

Children go to school to academically and socially learn in order to eventually become adults who are productive members of society. For learners with disabilities, however, researchers and educators predominantly focus on the psychosocial influences of inclusion and very little attention is paid to the actual academic learning that transpires when learners with disabilities attend mainstream classes (Zoniou-Sideri & Vlachou, 2006). In a study of inclusion in Lesotho (Johnstone & Chapman, 2009), teachers were found to teach learners with disabilities in their classes in the few extra minutes they had available in the school day. Moreover, the teachers admitted that their pedagogical approaches were not effective for learners with disabilities, but were fine for the rest of the class (Johnstone & Chapman, 2009), indicating that ensuring that learners with disabilities actually were engaged and participating in the learning process within the classroom was not a priority for some teachers.

Teachers also have reported that they thought socialization and peer acceptance were the major benefits of inclusion, while few teachers believed that learners with disabilities would profit cognitively or develop in terms of their future career potential (Zoniou-Sideri & Vlachou, 2006). According to Zoniou-Sideri and Vlachou (2006), such emphasis on only the social and moral benefits of inclusion, often influenced by a charitable type of humanism, hinders the translation of this moral commitment into the assertion of right. In other words, if learners with disabilities are only treated as children who are to be loved and cared for without giving them academic instruction

or setting expectations or goals for their learning, then, learners with disabilities are never given the opportunity to be empowered. Despite good intentions, the caring and loving mind-set can become detrimental for learners with disabilities if they are not expected to acquire academic skills in school.

2.4 Teachers' Perceptions on Curriculum Adaptation and Learner Diversity

Global views pertaining to the provision of education for children with disabilities have been shaped over the years by local and international legislation and national policies. The display of negative tendencies towards children with SEN integrated in general education classrooms has encouraged researchers to examine the reasons spurring the negativity (Shari & Vranda, 2016). Teacher' views and perceptions relating to inclusion are just as important as material and policy support in implementing inclusion successfully (Shari & Vranda, 2016). A teacher will show a high level of commitment to his or her beliefs and values about students in a classroom. Odongo and Davidson (2016) posited that educators in any country are the driving force behind inclusive education. Hunter-Johnson and Newton (2014) maintained that the voices and opinions of teachers are critical on issues regarding inclusion because teachers are vital to the implementation in their classrooms. The successful implementation of inclusion depends on teachers' beliefs and perceptions.

Inclusive education in general is the provision of education for people with physical or psychological barriers or in the broader sense, it is the actual involvement of each child in the curriculum, the environment and the interactions that exist in the school without discriminating background (Hunter-Johnson & Newton, 2014). The existence of inclusive education is intended to develop the potential and save their future from

educational discrimination that tends to neglect children with disabilities. (Hunter-Johnson & Newton, 2014).

Reception of children with SEN by public schools and communities in inclusion environments makes children with SEN have a wider opportunity to get education like other nondisabled children to be better able to develop the potential as needed. Just as positive teachers' perceptions foster an easier participation of students. Perceptions towards students with disabilities play a part in their participation in the classroom curriculum with disabilities, the same is true for the perceptions of regularly abled students (Umesh & Laura, 2016). When students in the general education body demonstrate positive perceptions towards students with disabilities, it creates a positive and welcoming environment for all (DeLaat, Freriksen & Vervloed, 2013). An unfriendly and negative perception from teachers or nondisabled students towards those with disabilities can create a destructive environment resulting in further problems. With classroom educators bearing the primary responsibility for the accommodation of children with SEN, information on their perceptions would be invaluable in designing professional development programs for them to support inclusionary practices and in implementing officially mandated inclusive strategies.

Characteristics of each child with SEN vary widely, including in learning. The diversity in each child needs to be accommodated by implementing the curriculum adaptation so that the learning can run optimally according to the students' ability (Mirasandi et al., 2019). Inclusion education curriculum uses a regular curriculum (national curriculum) that is modified according to the stage of development of children with SEN, taking into account the characteristics and level of intelligence of each student (Supardjo, 2016). Mirasandi, et. al (2019) postulated that the model

curriculum in inclusion for children with SEN can be grouped into four, namely: duplication curriculum, modification curriculum, substitution curriculum and curriculum omission. Curriculum duplication is a child with special needs using a curriculum whose level of difficulty is equal to the average regular student. This curriculum model is suitable for children with visual impairment, children with hearing loss, children with speech impairment, a child with a physical disorder, and a child with behavioural disorders. These children have no intellectual barriers; however, it is necessary to adapt the process using Braille for children with visual impairment, and children with hearing loss using sign language in their delivery. Curriculum modification is an average/ regular student curriculum tailored to the needs and abilities/potential of children with SEN. The substitution of the curriculum is that some parts of the average/regular child curriculum are abandoned and replaced with more or less equivalent. This curriculum model for children with SEN tailored to the situation and conditions. Omission Curriculum is part of the general curriculum for certain subjects totally eliminated, because it is not possible for children with special needs to be able to think equals the average child.

According to Divine (2013), the curriculum components that need to be adapted to suit the needs of children with SEN include objectives, materials or teaching materials, instructional strategies, instructional media, and learning evaluations. The curriculum objectives are intended for the development of demands, conditions, and needs of society and are based on thoughts that are consistent with philosophical values. Divine (2013) added that children with SEN who have above average intelligence, the material within the regular school curriculum can be extended and deepened and added new material not present in the regular school curriculum, but the material is considered important for gifted children. Children with SEN who have

relatively average intelligence of material in the regular school curriculum can be retained or the degree of difficulty is lowered slightly. Meanwhile, children with special needs who have below average intelligence of material in the regular school curriculum can be reduced or lowered difficulty levels as needed or even eliminated certain sections.

On the issue of learning process, Divine (2013) opined that Based on the learning process, there are two learning strategies, namely (1) Learning planning should be made based on assessment results and made together between classroom teachers and special teachers in the form of individual learning programme, (2) Implementation of learning prioritizes cooperative and participatory learning methods, the same opportunities as other students, are shared responsibly and implemented collaboratively between special teachers and classroom teachers, and by using diverse media, resources, and environments with circumstances.

He added that the use of media as an intermediary in the learning process has value and function that is very valuable for the creation of a conducive learning climate. The use of media to train children to strengthen the sensitivity and skills is optimally supported by teacher motivation. The curriculum assessment is intended to see the effectiveness of the curriculum used by teachers in applying the curriculum.

The implementation of inclusive education is not without challenges which include but not limited to a difficulty in harmonizing the regular school service standards that have been running and the variation in the learning needs of children with disabilities; school have not been able to provide the right programme for children with SEN with conditions of intelligence below average; there is no evaluation system learning outcomes, both normative and summative appropriate to the needs of children with

SEN; the lack of learning resources and facilities that accommodate the mobility and learning needs of children with disabilities; not all regular teachers have the competence to provide children with SEN services and the lack of special teachers in inclusive schools.

2.4.1 Adaptation of the curriculum and assessment procedures to ensure access to learners with diversities

Globally, practices are emerging to support educating students with severe disabilities in general education contexts (Kozleski, Yu, Satter, Francis, & Haines, 2015; Kurth, Lyon, & Shogren, 2015; Olson, Leko, & Roberts, 2016). The Individuals with Disabilities Education Act (IDEA, 2004) emphasizes the involvement and progress of students with disabilities in general curriculum; placing students with severe disabilities in general education classes provides a research-based way to meet this requirement (Lee, Wehmeyer, Soukup, & Palmer, 2010). In inclusive classrooms, in which children with and without disabilities are taught together, high expectations and presuming competence in relation to grade-level curriculum are the standards for all children (McLeskey, Waldron, & Reed, 2014).

Students who have severe disabilities constitute less than 2% of the student population. They have diverse learning and behavioural characteristics, extensive educational support needs, and they are likely to require alternate assessments (Kurth et al., 2015). Educators who include these students have reported favoring approaches that support all students in active, typical ways (Giangreco, Dennis, Cloninger, Edelman, & Schattman, 1993). Practices such as differentiated instruction and flexible grouping can effectively address the learning of all students (Tomlinson, 1999). In addition, Universal Design for Learning (UDL) offers a pathway for educators to intentionally

plan for and deliver instruction and assessment across a wide array of learners (Lowrey, Hollingshead, Howery, & Bishop, 2017).

Yet, even with these practices in place, at times, students with severe disabilities may still require adaptations. The use of adaptations is a practice known to support students who have severe disabilities in inclusive classrooms (Downing & Peckham-Hardin, 2007; Janney & Snell, 2006). The concept of adaptations is broad, potentially involving changing instruction, altering content, and/or adjusting criteria to better meet learner needs (Wakeman, Karvonen, & Ahumada, 2013). For example, a fourth grader with severe disabilities can participate in a grade-level social studies lesson if provided with pre-labeled landmarks to complete the same map of the states being completed by classmates, the latter being required to produce written responses. Well-designed adaptations facilitate social and academic participation, promote independence, are only as special as necessary, are age and culturally appropriate, focus on student success rather than deficits, and are easy to use (Janney & Snell, 2006; Kurth & Keegan, 2014). They can increase academic engagement, reduce off task behaviors, and increase teacher expectations (Fisher & Frey, 2001; Lee et al., 2010; McDonnell, Mathot-Buckner, Thorsen, & Fister, 2001).

Moreover, such adaptations can enhance student progress when used over multiple academic years (Hedeen & Ayres, 2002; Ryndak, Morrison, & Sommerstein, 1999). Despite the fact that we know adaptations are beneficial, challenges exist (Kurth, Gross, Lovinger, & Catalano, 2012). Studies have shown mixed patterns with respect to the reliable provision of needed adaptations for students with disabilities across general education contexts (Dymond & Russell, 2004; Kurth et al., 2012; Lee et al., 2010; Wehmeyer, Lattin, Lapp-Rincker, & Agran, 2003). Moreover, adaptation

processes require collaboration between education team members, which is often absent (Janney & Snell, 2006; Kurth et al., 2012). Finally, Downing and Peckham-Hardin (2007) have noted that there is not only a need for adaptations to be available, but also a need for better adaptation.

2.4.2 Teachers' Academic Expectations for Learners with Disabilities

Children go to school to academically and socially learn in order to eventually become adults who are productive members of society. For learners with disabilities, however, researchers and educators predominantly focus on the psychosocial influences of inclusion and very little attention is paid to the actual academic learning that transpires when learners with disabilities attend mainstream classes (Zoniou-Sideri & Vlachou, 2006). In a study of inclusion in Lesotho (Johnstone & Chapman, 2009), teachers were found to teach learners with disabilities in their classes in the few extra minutes they had available in the school day. Moreover, the teachers admitted that their pedagogical approaches were not effective for learners with disabilities, but were fine for the rest of the class (Johnstone & Chapman,

2009), indicating that ensuring that learners with disabilities actually were engaged and participating in the learning process within the classroom was not a priority for some teachers. Teachers also have reported that they thought socialization and peer acceptance were the major benefits of inclusion, while few teachers believed that learners with disabilities would profit cognitively or develop in terms of their future career potential (Zoniou-Sideri & Vlachou, 2006). According to Zoniou-Sideri and Vlachou (2006), such emphasis on only the social and moral benefits of inclusion, often influenced by a charitable type of humanism, hinders the translation of this moral commitment into the assertion of rights. In other words, if learners with disabilities are

only treated as children who are to be loved and cared for without giving them academic instruction or setting expectations or goals for their learning learners with disabilities are never given the opportunity to be empowered. Despite good intentions, the caring and loving mindset can become detrimental for learners with disabilities if they are not expected to acquire academic skills.

2.5 Teachers' Views on Inclusive Learning Environments

Education is the most essential ingredient in the development and empowerment of individuals, and inclusion in education irrespective of the varied socio-economic differences and the differences in 'abilities' and 'disabilities' (Praisner 2003), undoubtedly makes this foundation much stronger (Ahmad, 2014). A school system emphasizing education for all should ensure the right of all children to a meaningful education based on individual needs and abilities (Johnson, 2002). Any child may experience a special need during the course of his educational years (UNESCO, 1994), and as a result, some children feel 'left-outs' and never enter school or enter only for a few years and, as repeaters, or become 'drop-outs' or 'pushed-outs', without their needs having been met. These children are a vivid illustration of the failure of schools to teach rather than their own failure to learn (Lindsey, 2007; Norwich, 2008). The geographical and social segregation of students with 'disabilities', from their 'non-disabled' peers, in learning and development, is further a failure of meaningfully integrating students in mainstream schools (Singh, n.d.). Inclusive education, more than mainstreaming the learners with SEN, is also concerned with identifying and overcoming all barriers for effective, continuous and quality participation of all in education (Ahmad, 2015a; Ramchand & Dummugudem, 2014), and providing a 'Least Restrictive Environment' (LRE) to satisfactorily afford children with disabilities a

meaningful educational benefit, together with others, in an accessible physical and human environment (Gal, Schreur, Naomi Engel-Yeger & Batya, 2010).

Overtime, there has been a considerable shift in the understanding of 'disability', from the earlier medical interpretations of seeing 'disability' as a 'deficit' within the individual, to the concept of human rights and equitable opportunities for participation of all individuals (Wolery, 2000). The social model of disability sees the systemic barriers, negative attitudes and exclusion by society (purposely or inadvertently) as the ultimate factors defining disability. This explains 'disability' as resulting from the interaction of an individual's 'functional status' with the physical, cultural, and policy environments (Shakespeare & Watson, 1997), where if the environment is designed for the full range of human functioning and incorporates appropriate accommodations and supports, then individuals with functional limitations would not be 'disabled' and can actively participate in the society (Lang, 2001).

Interventions, to be inclusive, should therefore not only be at the individual level, like medical rehabilitation, but also at the societal level, with provision of necessary support services, a universal design to make infrastructure more accessible, and a change in attitude and perception regarding disability; promoting inclusive education systems and community awareness programs to combat stigma. The use of adaptations especially in the environment is associated with a range of positive characteristics, including: higher student engagement, fewer student competing behaviors, and less teacher time dedicated to classroom management (Lee, Wehmeyer, Soukup, & Palmer, 2010).

Furthermore, teachers report that their students learn more and are better able to participate in class activities through the use of adaptations (Kurth & Keegan, in press).

Curricular and environment adaptations have also been found to improve student on-task behaviour and work-production (Kern, Delaney, Clarke, Dunlap, & Childs, 2001). Additionally, many educators support the idea of adaptations (Idol, 2006). Finally, for inclusion to be successful, the use of adaptations is necessary to meet individual student needs (Cross, Traub, Hutter-Pishgahi, & Shelton, 2004) and adaptations do facilitate access to the general education curriculum (Fisher & Frey, 2001).

Use of Assistive Technology in Inclusive Education – Making Room for Diverse Learning Needs

> *"The real miracle of technology may be the capacity it has to remove previously insurmountable barriers faced by persons with disabilities"* (Simon, 1991 p.3).

Technology has great potential in providing access for all learners, and the ability to access the general education curriculum. Assistive technology is a generic term that includes assistive, adaptive, and rehabilitative devices for individuals with disabilities and includes 'virtually anything that might be used to compensate for lack of certain abilities' (Reed & Bowser, 2005), ranging from low-tech devices like crutches or a special grip for a pen, to more advanced items like hearing aids and glasses, to high-tech devices such as computers with specialized software for helping dyslexics to read (WHO, 2009). Also known as 'technical aids', or 'assistive equipment', including information and communication technologies (ICT), universally designed technologies, educational technologies, emerging and innovative technologies, and accessible technologies; they can be any item, piece of equipment or product system that is used to increase, maintain, or improve the functional capabilities of individuals with disabilities, and help them to work around or compensate for a disability' (Goddard, 2004: p.2), in order to participate in the activities of daily life.

From a simple device like a magnifying glass, to a complex computerized communication system; depending on their nature of use and application, assistive technology devices can be used by students with disabilities on their own or with assistance, in and outside the learning setup. Some of the examples of assistive technology devices are - touch control devices, alternative keyboards and mouse, speech-to-text word recognition tools, word prediction programmes, word processors, grammar checkers, scanners, compact disc recording (CD-R and CD-RW) drives and spell checkers (Petty, 2012).

Approaches in the use of assistive technology in inclusive education focus on using technology to train or rehearse, and to assist and enable learning. A large population of 'at risk' students are seen to need assistance, but since they often don't easily fit into a diagnostic profile, they often lack assistance. Assistive technology serves in bridging this gap by 'assisting' in the practice of educating children in the same classroom, including children with physical, mental and developmental disabilities (Smith, Austin, Kennedy, Lee & Hutchinson, 2005); helping them to learn the material in a way that they can understand, by eliminating barriers that had been preventing them from being at the same level as their peers. Offering practical tools for application of the principles of cognitive theory to teaching and learning, assistive technology connects a student's cognitive abilities to an educational opportunity that may not be accessible due to a disability; like a student facing difficulty in decoding text can make use of a text-to-speech screen reader as a 'bridge' between the written text and the ability to process the information aurally and cognitively; while a student who has difficulty sequencing thoughts in text can use graphic outlining software as a bridge to visual processing skills (Hern´andez, 2003). Hence, with effective integration of assistive technology into the regular classroom, students can have the provision of

multiple means to complete their work, with greater independence in performing tasks that they were formerly unable to accomplish or could accomplish with great difficulty; through suitable enhancements or changed methods of interaction with the technology, needed to accomplish such tasks.

The role of the environment in influencing the perception of teachers towards inclusion

A number of studies have examined environmental factors and their influence in the formation of teachers' perceptions towards inclusion. One factor that has consistently been found to be associated with more positive perceptions is the availability of support services at the classroom and the school levels (Clough & Lindsay, 1991). Here, support could be seen as both physical (resources, teaching materials, IT equipment, and a restructured physical environment) and human (learning support assistants, special teachers, speech therapists).

Janney and Snell (2006) found that, the majority of teachers in their study were hesitant initially to accept children with SEN in their classes, because they anticipated a worst case scenario where both they and the children with SEN would be left to fend for themselves. Later, these teachers were receptive towards these children after having received necessary and sufficient support. Respondents acknowledged that the support received from the relevant authorities was instrumental in allaying their apprehension that part-time integration would result in extraordinary workloads. A significant restructuring of the physical environment (making buildings accessible to students with physical disabilities) and the provision of adequate and appropriate equipment and materials were also instrumental in the development of these positive perceptions. Besides those mentioned by Janney et al. (1995), other forms of physical support, such as availability of adopted teaching materials (LeRoy & Simpson, 1996), and smaller

classes (Clough & Lindsay, 1991), have also been found to generate positive perceptions towards inclusion.

Support from specialist resource teachers was also identified as an important environmental factor in shaping positive teacher perceptions towards inclusion (Kauffman et al., 2009). Janney et al. (1995) found that one of the factors cited by their respondents that had contributed to the success of the part-time integration programme they were implementing was the existence of effective support, both interpersonal and task related, provided by the school's special education teachers. Clough and Lindsay (1991) argued that special education specialist teachers are important co-workers in providing advice to subject specialist teachers on how to make a particular subject accessible to children with SEN.

Centre and Ward (1997) found that children with a mild sensory disability integrated in mainstream classes did not cause anxiety to mainstream teachers because of the confidence generated by the presence of itinerant teachers for these children. Their study showed that experience of working with itinerant teachers positively affected teachers' perceptions. The importance of support from specialist resource teachers was also highlighted in another study conducted in the USA (Minke et al., 1996), which compared the perceptions towards inclusion and the perceptions of self-efficacy, competence, teaching satisfaction and judgments of the appropriateness of teaching adaptation of regular education teachers who co-taught with resource teachers in inclusive classrooms and their counterparts in traditional classrooms. Regular teachers in inclusive classrooms reported positive perceptions towards inclusion and high perceptions of self-efficacy, competence and satisfaction. Regular teachers in traditional classrooms held less positive perceptions and viewed classroom adaptations

as less feasible, and less frequently used, than did teachers in classrooms with the protected resource of two teachers.

Other aspects of the mainstream school environment have also been identified in the above studies as being obstacles that have to be surmounted in order for inclusive programmes to be successfully implemented; for example, more often than not, teachers report overcrowded classrooms, insufficient instructional materials (differentiated packages), insufficient time to plan with learning support team, lack of a modified/flexible timetable, inadequately available support from external specialists and lack of regular INSET (Avramidis et al., 2000).

In the Myles and Simpson (1999) investigation, for example, 48 out of 55 teachers (87.2 per cent) reported their perceived need for 1 hour or more of daily planning time for inclusion. It could be said that mainstream teachers feel that implementing an inclusive programme would involve a considerable workload on their part, as a result of increased planning for meeting the needs of a very diverse population. In this respect, human and physical support can be seen as important factors in generating positive perceptions among mainstream teachers towards the inclusion of children with SEN.

2.6 Challenges Teachers Face in Teaching Children with Disability in Inclusive Schools

Some teachers are of the view that educating students with and without disabilities in the same classroom faces some challenges such as modification in the curriculum and instruction, teachers' confidence level, collaboration between the teachers and the school administration, experience in dealing with students with disabilities and assessment and grading practice in an inclusive classroom. Loreman et al., (2007) found that, factors such as close contact with a person with disability, teaching

experience, knowledge of policy and law, and confidence levels of significant impact on student teachers perception towards inclusion. Bones and Lambe (2007) have reported that training in special or inclusive education and experience teaching or relating to students with disabilities have positive impact on perception and perception.

In addition, such positive perception supports the potential for more successful inclusive programmes or experiences for students (Kuyini & Desai, 2008; Subban & Sharma, 2006). Possessing previous experience as an inclusive educator appears to positively predispose teachers toward inclusive education (Hodge & Jasma, 2000). It would appear that previous contact with persons with disabilities allows regular education teachers to feel comfortable within the inclusive classrooms. Direct experience of including students with disabilities into mainstream settings appeared to be an essential factor in shaping teachers views toward inclusive settings (Giangreco et al., 1993) Brown (1996), in her 4-nation UNESCO study of approximately 1000 teachers with experience in teaching children with disabilities, reported a wide difference in perceptions regarding inclusive education. These teachers favoured inclusion of different types of children with disabilities into the general classroom.

Brown noted that in countries that had a law requiring inclusion, teachers expressed favourable views ranging from 47% to 93%. However, teachers from countries that offered mostly segregation education were less supportive to inclusion with their favourable views ranging from 0% to 28%. These findings show that, when teachers are exposed to teaching student with disabilities, they will develop positive perceptions for inclusion. Cook and Landrum (2000) found that teachers with seven or more years of teaching experience with students with disabilities in inclusive classrooms felt that

they could potentially meet the needs of more students with disabilities in their classrooms than did teachers with fewer years of inclusive experience.

Good and Brophy (1992) also documented that experienced teachers provide students with disabilities in inclusive settings with more teacher praise, encouragement to do their best, opportunities to answer questions, and more carefully monitoring their performance. However, other researchers have noted that the mere experience of contact with students with disabilities not lead to the formation of more positive perception toward inclusion (Center & Ward, 1997). Stephens and Braun (2000) reported a non- significant correlation between contact with student with disabilities and teachers' perception towards inclusion. In contrast, Forlin (2005) reported that teachers with more experience hold more negative perception towards inclusion.

Some mainstream teachers claimed that they had chosen to teach a specific discipline and not special education, and inclusion policy forced them to enter areas they were unsure about or not interested in it. Forlin (1995) found that the most experience educators (i.e., teachers with more than 11 years of teaching experience) reported the lowest level of acceptance for inclusion. Moreover, the highest level of acceptance was found among teachers with less than six years of teaching experience in an inclusive classroom. Based on these inconsistent findings, it seems that nature of the inclusion practice or experience, whether pleasant or not, is what determines the impact on perception.

Successful implementation of inclusive education demands collaboration between the school administration and the teachers. The administration should be committed in providing the appropriate materials necessary for inclusive practices as this could be a challenge to teachers. Administrative support has also been cited as a significant

factoring determining teacher perception towards inclusion, as the teacher feels Reaffirmed if the school principal fosters a positive learning environment for both teachers and students. (Idol, 2006).

Teachers believe that the support of the principal and other school leaders are critical in order for them to implement inclusive practices (Gameros, 1995). Principals need to accept ownership of all students and support inclusive placement in order to inspire these feelings among other school's personnel (Gameros, 1995). However, research suggests that administrators' perception towards students with disabilities is less than positive; thereby impacting on the process of inclusion in schools (Daane, Beirne-smith & Latham, 2000). Further research commented that administrators may hold positive views of inclusion as they are further away than mainstream teachers, in terms of actual experience (Larrivee & Cook, 1979). Lack of administrative support may lead to lack of teachers' confidence and may feel reluctant to give their best in an inclusive classroom.

Sigafoos and Elkins (1994) concluded that mainstream educators generally lacked confidence as they attempted to include students with disabilities into their classes. This may be as a result of lacking proficiency about modifying the regular education curriculum to suit students with individual learning needs. Further, Avramidis et al. (2000) support the view that teachers who perceive themselves as competent inclusive educators often have more positive perception towards inclusive education (Janney et al., 2006). The authors also asserted that teachers acquire increased competence as a result of increased training in the field of inclusive education. Inadequate knowledge with regard to instruction techniques of curricular adaptations which contribute to decreased confidence may be factors which influence teachers' perception toward

inclusive education. For teachers to feel confident to teach disabilities student, they should be able to modify the curriculum to suit every individual in an inclusive classroom.

Miller and Savage (1995) indicated that, the success of inclusive schooling efforts is largely dependent on the general education teachers' ability and willingness to make appropriate modifications to accommodate the individual differences. Ensuring that the needs of all students will be met with inclusion, (McDonald, Mathot-Buckner, Thorsen & Fister, 2001), reviewed some challenges along with possible solutions when integrating students with disabilities into the regular classroom.

These challenges include; 1) providing functional curriculum in a regular classroom, and 2) providing community-based instruction. For example, a student with severe disability such as an intellectual disability may have trouble with routine hygiene skills. These deficits may alienate the child more if not addressed. The teacher can use this opportunity to reinforce appropriate behaviour for the disabled student as well as the entire class. The issue of hygiene, whether it is daily grooming skills or appropriate table manners can be incorporated in the class 'health' curriculum. The disabled student will then work on the area of deficit without being singled out in front of their peers while the rest of the class has the benefit of having these skills reinforced.

Another strategy outline was providing community-based instruction. This can be defined as allowing the community, whether individual or agencies the opportunity to enhance a lesson with real-life experiences. For example, if there is a fire safety lesson in the curriculum, this may provide the perfect opportunity for local fire fighters to present to the class. Often the professionals will bring fire equipment or a video, which will help reinforce the lesson. All students benefits from this type of multi-sensory

approach (i.e. coordinating the visual aids with the lecture. If teachers are able to adapt the curriculum in this way, they could enhance inclusive practices.

Assessing and grading of students with and without disabilities in the general classroom seems to be difficult to many teachers. Assessment is a complex process for teachers. Teacher training is assessment is important because, ultimately, classroom practices result in grades that impact promotion, standing, and future opportunists for students (Allen, 2005). Teachers use assessment tools to monitor learning and then they assign grades to students which areas supposed to summarize and capture the extent to which students have learned. Grading is the most common method of communicating student learning whether a student has learned something or not (Allen, 2005). Grades summarize assessment, made by teachers and professionals for students at the end of a specified time (Allen, 2005; Tomlison, 2005).

Classroom assessment and grading practices are meant to enhance the learning process, facilitate instruction, and encourage opportunities for new knowledge to be gained (Campbell & Collins, 2007). Assessment in an inclusive classroom could be formative which means that, the assessment should focus on the individual learners and incorporate wide variety strategies that teachers and learners use in collaboration or summative which is called assessment of learning (Klecker, 2002). It is used to confirm what students know and how well they have met curriculum guidelines (Allen, 2005). It assesses how well students have met their own personalized programme goals or determines future placement in programs. It is used to communicate achievement to parents, other teachers and institutions, employers, government, and general public (Allen, 2005). These assessment practices seem to be difficult as the individual

teachers may not be competent enough to carry out this type of assessment. Formative assessment is typically called assessment for learning (Campbell & Collins, 2007).

Formative assessment acknowledges that students learn in diverse and individual ways, but there are still predictable patterns that they will follow in increasing their proficiency. Teachers are aware of this universal process and effectively guide students and adapt to meet them where they are at their learning process. This requires time, knowledge and understanding of student development and ability to adapt regularly and appropriately (Boston, 2002). Formative assessment maintains that the student is in the central learning process. Students take ownership for their own learning as the teacher provides direction, guidance and feedback to achieve the desired outcomes.

This a complete time consuming, and challenging task for educators in inclusive classrooms (Boston, 2002). These assessment practices will therefore require changes which enhance learning for students and to make inclusive classroom assessment meaningful. Even though it may be challenging, teachers can develop assessment tools that create reliable, valid and meaningful learning opportunities that communicate achievement. Some teachers have not been exposed to disabilities classrooms and this can be a disadvantage. Educators need to coordinate efforts and understand the needs of the classroom in terms of developing skills and lesson plans (Avramidis & Norwich, 2002). Students with severe and profound disabilities require more adaptation and medical attention than the average student (Avramidis, Baylies & Burden, 2000). Teachers must be skilled in handling severe disabilities and create lesson plans based on individual abilities and adhere to dietary needs of the child. Lack of experience can lead to the child not progressing with skills or cause of adverse medical incidents (Ross-Hill, 2009).

Disability inclusion classrooms must be able to involve its students in all classroom activities. Teachers need to address how the classroom will communicate with each other and encourage participation. If there is a lack of adaptive equipment or adaptive communication and language tools, it makes it difficult for teachers to function as a united classroom (Burke & Sutherland, 2004). When there are children of all abilities in the classroom, both physical and academic, children in the middle can easily fall between the cracks. These children can have learning disabilities, hearing impairments, or language delays to name a few. Providing the right amount of attention and adaptation can be challenging, especially if there is a higher teacher to student ratio (Forlin & Chambers, 2011). Normally, inclusive classrooms have a regular educator and special needs educator. Due to the nature of the classroom and size, it is imperative that there be an appropriate number of teacher aides to assist the teachers with day-to-day activities (Burke & Sutherland 2004). Not all students have been exposed to persons with disabilities and this becomes a challenge to teachers.

Teachers must not tolerate insensitiveness and cruelness and teach that all students are to be treated with respect, regardless of ability (Ross-Hill, 2009). As some students are not use to dealing with persons with disabilities, parents are no exception (Ross-Hill, 2009). Teachers need to convey to parents how the classroom is conducted and that all educational needs will be met (Westwood & Graham, 2003). Further because there are varying abilities in the classroom, teachers can be challenged to address individual academic needs based on ability (Westwood & Graham, 2003). Although many schools are moving towards disability inclusive classrooms, there are a number of issues or challenges that need to be addressed. Preparing and training a teacher is the first step in making disability inclusive classrooms a success.

CHAPTER THREE

METHODOLOGY

3.0 Introduction

This section presents the methodology that guided the study. Specifically, the section covers research design, study setting, population (target), sample size and sampling technique, data collection instruments, issues of validity and reliability, data analysis and ethical considerations.

3.1 Research Design

In research design, it is believed that a good and careful design ensures that the research is valid and could yield consistent results every time (Yin, 2014). In view of this, the current study employed the descriptive survey design. According to Creswell and Creswell (2018) descriptive survey is mostly used to compare variables, and may be directed more toward learning about a targeted population. Danso (2009) also stated that a descriptive survey provides a more accurate and meaningful picture of events or seeks to explain people's perception and behaviour on basis of what data is gathered at a particular time. This design was adopted for the study because it afforded the researcher the opportunity to seek the perception of teachers about inclusion, and gear it towards that targeted population (Creswell & Creswell, 2018; Danso, 2009).

3.2 Target Population

The study targeted 525 teachers (224 female teachers and 301 male teachers) from 75 schools (40 Primary Schools and 35 Junior High Schools) in the Kwahu East District in the Eastern Region of Ghana.

3.3 Sample Size

The total sample size for the study was 200 basic school teachers drawn from 25 basic schools in the district.

3.4 Sampling Technique

A multi sampling technique was used to determine the sample size. The simple random sampling technique was used to select the research setting; that is the 25 schools selected for the study while census technique was used to select the participants from the schools. In each of the 25 schools, there are 8 teachers. All the teachers were selected in the study.

3.5 Research Instrument

The study employed questionnaire for the study. The use of questionnaires helps the researcher to cover large number of respondents in the study (Kusi, 2012). The questionnaires contain closed-ended questions which were designed by the researcher based on the empirical studies in the related literature. Bird (2011) argues that questionnaires are popular and fundamental tools for acquiring information on public knowledge and perception. The questionnaire uses a four-point Likert scale such as "Strongly Agree", "Agree", "Disagreed", and "Strongly Disagreed" to rate their response.

3.6 Validity and Reliability

3.6.1 Validity

An instrument is said to be valid if it measures what it is supposed to measure (Creswell, 2010). To ensure face validity, the questionnaire was given to colleagues and other graduates of special education to determine whether the items appeared to measure the underlying variables. These colleagues made suggestions relating to

grammatical errors, typographical mistakes, and ambiguities which were considered in reshaping the instruments. To ensure content validity, the questionnaire was submitted to the supervisor who checked that the questions reflect the concepts being studied and that the scope of the questions is adequate as suggested by (Tambara, 2015). Hence, supervisor's guidance helped the researcher to make corrections in the questionnaire.

3.6.2 Reliability

To ensure reliability in the study, the researcher pre-tested the instruments in about three schools which were not part of the sampled schools but have similar characteristics in order to test the instruments before the actual collection of data. The instruments would be pilot-tested and revised the inaccuracies appropriately to enhance their efficacy. Reliability analyses of the pre-tested questionnaires were carried out using Crombach's Alpha statistics. According to Crombach's Alpha reliability, coefficient values 0.70 and above are considered reliable. Three basic schools, which comprised 18 teachers, were selected for the pre-test to help to address any possible ambiguities.

3.7 Data Collection

Before the fieldwork, I obtained an introductory letter from the Department of Special Education, University of Education, Winneba, to help secure permission from the schools. I visited the head teachers of the schools and introduced myself and the purpose of the study was explained, and how they will be involved in the study. Due to the large scope of the study, I recruited two field assistants who helped me with the data collection procedures. The field assistants were trained to help in the administration of the questionnaires and coding of the data. The assistants were selected

from the study area. I explained the purpose of the study, ethical responsibilities and method of sampling participants during the training.

Before the questionnaire is administered, each head teacher of the various sampled schools convened a meeting involving the classroom teachers for me to introduce and explain my study to them and also to familiarise myself with the school environment. I assured participants of the confidentiality of their responses. Subsequently, the questionnaires were personally administered to the teachers. The questionnaires were collected after completion in one-week time and gathered for analysis.

3.8 Data Analysis and Interpretation

The researcher used descriptive statistics such as; frequencies and percentages to analyse the quantitative data of the study.

3.9 Ethical Considerations

Bless, Higson-Smith and Kagee (2006) explained that the word "ethics" is derived from the Greek word "ethos", which means one's character. It has to do with the term "morality". A moral issue is concerned with whether behaviour is right or wrong, whereas an ethical issue is concerned with whether the behaviour conforms to a set of principles. Creswell (2010) noted that ethical issues are integral to the research process and therefore need to be carefully considered before executing the research process. The researcher among others assured the respondents of anonymity and confidentiality. This was done to make sure that their privacy and integrity was highly respected and protected. The information given to the researcher was used solely for the purposes of this study. The researcher throughout the study avoided the use of enticement (giving out money or gift). This was done to ensure that the responses that came out of the

respondents were genuine. Throughout the period of the study, researcher was skeptical and adhered strictly to ethical issues to ensure reliability and accuracy of data.

CHAPTER FOUR

PRESENTATION AND ANALYSIS OF RESULTS

4.0. Introduction

This section provides analyses of the data generated from the questionnaire administered to the participants. The data were analyzed based on the research questions raised to guide the study. In the analysis of the questionnaire data, the two extremities of the responses were combined, such as Strongly Agree (SA) and Agree (A) as one idea, and Strongly Disagree (SD) and Disagree (D) as one, for the purposes of discussions. The results of the frequency distributions of opinions expressed by respondents to each set of items for each research question were used for the data analysis.

Research Question 1: What are the perception of teachers towards the inclusion of learners with disabilities?

Table 1 represents the responses of teachers on their attitudes towards the teaching of special needs children inclusive schools. It covers questionnaire items 1 to 7.

Table 1: Teachers' Perceptions on the Inclusion of Children with Disabilities

Statements	Agree	Disagree	Total
1. Only learners with mild disabilities should be brought to inclusive classrooms	175(88%)	25(12%)	200 (100%)
2. I have not taken any detailed course on learner diversity to be able to handle learners with disabilities	180(90%)	20(10%)	200 (100%)
3. There will be greater challenges in handling learners with disabilities in the general classroom	195(98%)	05(02%)	200 (100%)
4. I don't have any training or in-service training in handling learners with disabilities in the classroom.	103(52%)	97(48%)	200 (100%)
5. I need additional material resources as well as human skills to be able to handle learners with disabilities	200(100)	00(00%)	200 (100%)
6. My school environment is well designed and appropriate for me to include learners with disabilities in my classroom	00(00%)	200(100%)	200 (100%)
7. Our higher institutions should rather train more teachers in disability issues for them to come and handle learners with disabilities	195(98%)	05(02%)	200 (100%)

Table 1 presents the views of teachers in Kwahu East District on how their perception influences the inclusion of children with disabilities in their classrooms. From the data gathered, teachers were of the view that only learners with mild disabilities should be included in the classroom as 175 (88%) of the participants agreed to that statement whilst only 25 participants representing 12% of the participants disagreed to the statement. Item two elicited responses from teachers as to whether they have undertaken courses of study on learner diversity to be well equipped to handle learner diversity or not., and 90% of the respondents (180) agreed to that statement that they cannot handle learner diversity in their classrooms because they have not studied any detailed courses on that. 20 respondents (10%) were of the view that they have undertaken detailed curses that have equipped them to be able to handle the learners.

Furthermore, the data sought to find out if the teachers' perceptions would be influenced by the work expected from them. So item 3 stated that there would be greater challenges in handling learners with disabilities in the general classroom and 195 (98%) of the respondents agreed that handling learners with disabilities will be very challenging to them whereas 05 (02%) disagreed that it will be challenging to them. With item 4, 103 participants representing 52% agreed that they have no training or in-service training in handling learners with disabilities in the general classroom, but 97 representing 48% of the respondents disagreed to that statement.

Moreover, all the respondents; 100% agreed that they would need additional material resources as well as human skills to be able to handle learners with disabilities. They further disagreed (100% of the respondents) that their school environments are well designed and appropriate for them to include learners with disabilities. Finally, 195 participants, that is 98% agreed that our higher institutions of learning should rather train more teachers in disability issues for them to come and handle learners with disabilities. 12 (02%) respondents however disagreed that our higher institutions of learning need to train more teachers on disability issues.

Research Question 2: What is the perception of teachers on the adaptation of the curriculum to meet the needs of diverse learners in inclusive schools?

Table 2 represents the responses from the teachers in the basic inclusive schools in the Kwahu East District in the Eastern Region on their perceptions in the adaptations of the curriculum to meet the needs of diverse learners in their learning environments. The data gathered from the teachers covers 15 items on the research question.

Table 2: Teachers' Perception on Curriculum Adaptation in Ensuring Learner Participation

Statement	Agreed	Disagreed	Total
1. I am positive that both learners with disabilities and those without disabilities can learn together and succeed.	177(89.5%)	23(10.5%)	200(100%)
2. The school learning environment is responsive to all learners.	50(25%)	150(75%)	200(100%)
3. I sometimes substitute the curriculum content so as to allow the participation of learners with disabilities.	20(10%)	180(90%)	200(100%)
4. I adapt my curriculum to meet learner diversity.	40(20%)	160(80%)	200(100%)
5. Learners with disabilities are exempt from participating in certain subjects	185(92.5%)	15(07.5%)	200(100%)
6. Learners with disabilities can learn the same content with those without disabilities provided there are no environmental barriers.	195(97.5%)	05(02.5%)	200(100%)
7. I adapt the curriculum objectives, teaching materials, instructional strategies, instructional media, and learning evaluations to suit the needs of special needs children.	135(67.5%)	65(32.5%)	200 (100%)
8. Learning planning is made together between the classroom teacher and the specialist teacher in the form of individual learning programs.	22(11%)	178(89%)	200(100%)
9. The learning environment has not been able to provide the right program for children with special needs with conditions of intelligence below average.	200(100%)	00(00%)	200(100%)
10. The lack of learning resources and facilities that accommodate the mobility and learning needs of children with disabilities makes inclusion difficult.	192(96%)	08(04%)	200(100%)
11. Not all regular teachers have the competence to provide children with special services.	184(92%)	16(08%)	200(100%)
12. There are inadequate special education teachers to augment the effort of the general curriculum teachers.	192(96%)	08(04%)	200(100%)
13. I employ differentiated instruction and flexible grouping to address the learning needs of all students.	75(37.5%)	125(62.5%)	200(100%)
14. I use Universal Design for Learning (UDL) to intentionally plan for and deliver instruction and assessment across a wide array of learners	90(45%)	110(55%)	200(100%)
15. My aim is to ensure that learners with disabilities benefit from the psychosocial influences of inclusion rather than the actual academic learning.	190(95%)	10(05%)	200(100%)

Table 2 represents the responses from the participants on their views on curriculum adaptation in inclusive learning environment. 15 items were presented to the participants to elicit their views. From the data, it was revealed that teachers have a positive mindset on the successes of learners with disabilities in inclusive learning environments as 177 participants representing 89.5% agreed to the statement that both learners with disabilities and hose without disabilities can learn together and succeed. However, 23 participants representing 10.5% responded otherwise. The items further sought the views of the teachers to ascertain what teachers have about the entire school learning environment. The respondents (50) representing 25% agreed that the learning environment is responsive to all learners while 175 representing 75% of the respondents disagreed that the school learning environment is responsive to all learners.

On the issue of curriculum instructional adaptations, participants were asked if they engage in content substitution for learners with disabilities and 20 (10%) of the participants agreed that they sometimes substitute the curriculum content to allow the participation of learners with disabilities while 180 (90%) disagreed that they substitute the curriculum content to allow the participation of learners with disabilities. Participants further responded if they adapt the curriculum to meet learner diversities in their instructions and only 40 participants (20%) agreed that they do that whilst 60% of the participants disagree that they adapt the curriculum to meet learner diversity.

Item 5 of the questionnaire items sought to find out from the participants if learners with disabilities are exempt from participating some subjects in the learning environment and 92.5% agreed whilst 7.5% disagreed that they exempt learners with disabilities from some subjects. Item number 6 stated that “learners with disabilities can learn the same content with their peers without disabilities provided there are no

environmental barriers". 97.5% agreed to that statement whilst 2.5% disagreed. It was further revealed from the data that 67.5% of the participants agreed that they adapt the curriculum objectives, teaching materials, instructional strategies, instructional media, and learning evaluations to suit the needs of special needs children whilst 32.5% disagreed. The data further showed that 11% of the respondents agreed that they do collaborative instructional planning in terms of materials and individual lesson planning with the specialist teacher whilst 89% representing 178 participants disagreed that they engage the specialist teacher in planning in terms of materials and individual learning programs in their inclusive classrooms. All the participants (100%) agreed that the learning environment has not been able to provide the right program for children with special needs with conditions of intelligence below average. Further, 96% of the participants agreed that the lack of learning resources and facilities that accommodate the mobility and learning needs of children with disabilities makes inclusion difficult whilst 04% disagreed.

On the theme of self-efficacy on curriculum adaptations, item number 11 stated that "not all regular teachers have the competence to provide children with special services" and 184

representing 92% of the participants agreed to that statement whilst 08% disagreed that some teachers do not the competence to provide children with disabilities special services. The participants further stated that there are inadequate special educators to augment the effort of the general curriculum teachers (96% agreed, 04% disagreed). Only 37.5% of the teachers stated they employ differentiated instruction and flexible grouping to address the learning needs of all students whilst 62.5 disagreed that they employ differentiated instruction and flexible grouping to address the learning needs of all students. Still under the instructional adaptations, the last but one item sought

from the teachers on their use of UDL in their instructions and only 90 participants representing 45% of the participants stated that they use Universal Design for Learning (UDL) to intentionally plan for and deliver instruction and assessment across a wide array of learners whereas 110 of the participants representing 55% hold a contrary opinion.

The last item on Table 2 sought to ascertain the aim of the general curriculum teacher on the learner with a disability in the inclusive classroom. The data showed that 95% of the participants' aim is to ensure that learners with disabilities benefit from the psychosocial influences of inclusion rather than the actual academic learning whereas 05% responded otherwise.

Research Question 3: What are the views of teachers on the appropriateness of the environment in the implementation of inclusive education in inclusive school?

Table 3 is a representation of the data gathered from the respondents (teachers) on their views on inclusive learning environment for the implementation of inclusive education in Kwahu East District in the Eastern Region of Ghana. The questionnaire items in this research question covers items 1-10.

Table 3: Teachers' Views on Inclusive Learning Environments

Statements	Agree	Disagree	Total
1. Some learners cannot succeed academically because of environmental barriers	180(90%)	20(10%)	200(100%)
2. Inclusion is difficult because there is social segregation between students with disabilities and those without disabilities	145(72.5%)	55(27.5%)	200(100%)
3. The design of the learning environment limits the participation of learners of disabilities in the learning environment	160(80%)	40(20%)	200(100%)
4. The only intervention that is needed for inclusion in based on the individual with disability (eg. Medical intervention)	130(65%)	70(35%)	200(100%)
5. My learners with disabilities learn better and participate more when I adapt the learning environment to suit them	182(91%)	18(09%)	200(100%)
6. Students with disabilities have access to assistive technology that helps them to overcome some environment barriers.	10 (05%)	190(95%)	200(100%)
7. There is inadequate support services both in the classroom and the school level for the inclusion of learners with disabilities	175(87.5%)	25(12.5%)	200(100%)
8. Large class sizes serve as a challenge for me to attend to the individual needs of the learners	160(80%)	40(20%)	200(100%)
9. Insufficient instructional materials and insufficient time to plan with learning support team makes participation limited for learners with SEN	175(87.5%)	25(12.5%)	200(100%)
10. Lack of a modified or flexible timetable for learners with disabilities in the general curriculum makes it difficult to engage in intervention processes.	190(95%)	10(05%)	200(100%)

Table 3 above shows the data from the teachers on their views about the appropriateness of their existing inclusive learning environment. The table contains 10 items which sought the views of teachers on how they perceive the appropriateness or otherwise of their classroom environments. The first item on the table enquired from the teachers on how they see their learning environment to either facilitate or impede smooth learning of their students. The data showed that 180 participants representing 90% of the respondents agreed that some learners with disabilities cannot succeed academically because there are existing environmental barriers in the learning environment. However, 10% of the participants with a nominal figure of 20 respondents disagreed to the statement that "some learners cannot succeed academically because of environmental barriers".

The data from Table 2 further show that the environment in which inclusion is practiced in their schools is segregatory as 72.5% (145 participants) agreed to the statement that "inclusion is difficult because there is social segregation between students with disabilities and those without disabilities" whilst 55 participants (27.5%) disagreed to that. The responses again show how the environment facilitates learning among learners with disabilities and 160 (80%) greed to the statement that "the design of the learning environment limits the participation of learners of disabilities" 40(20%) disagreed that the environment limits the participation of learners with disabilities.

The data again show that teachers do not see a disability from the social model, but rather medical model as majority of them (130 representing 65% of the respondents) agreed that the only intervention that is needed to ensure full participation is on the learner with a disability and not the environment. They participants however agreed that their learners learn better when they adapt the learning environment to suit the needs of such learners with disabilities (182, 92%).

Furthermore, the data reveal that learners with disabilities do have access to assistive technology that will help them overcome environmental barriers. This is evident as only 10 participants representing 05% of the participants agreed that students with disabilities have access to assistive technology that helps them to overcome some environment barriers whereas 190 participants of 95% disagreed that students with disabilities have access to assistive technology that helps them to overcome some environment barriers. The data further show that 175 participants representing 87.5% agreed to the statement "there is inadequate support services both in the classroom and the school level for the inclusion of learners with disabilities" whereas 25 (12.5%) of the participants disagreed to that.

Moreover, the data revealed that large class sizes serve as a challenge for teachers to attend to the individual needs of the learners as 160 (80% agreed the statement that large class sizes serve as a challenge for me to attend to the individual needs of the learners. Finally, insufficient instructional materials, and rigid timetable as well as insufficient allotted time for individualized tuition all serve as challenges for teachers in the learning environment. About 175 (87.5%) agreed that there are insufficient instructional materials and insufficient time to plan with learning support team makes participation limited for learners with SEN. Again, 190 participants representing 95% also agreed that lack of a modified or flexible timetable for learners with disabilities in the general curriculum makes it difficult to engage in intervention processes.

Research Question 4: What challenges do teachers face in teaching of children with disabilities in inclusive schools in Kwahu East District?

Table 4 is the data gathered from teachers in regular classrooms in Kwahu East District on the challenges they face in teaching children with disabilities in inclusive schools. 7 items were posed to the respondents.

Table 4: Challenges Teachers Face in Teaching Children with Disability in Inclusive Schools

Statement	Agreed	Disagreed	Total
It will be difficult to modify the educational curriculum to meet the needs of learners with disabilities	122(61%)	78(39%)	200(100%)
I don't have enough experience in handling learners with disabilities	170(85%)	30(15%)	200 (100%)
The assessment procedure for learners with disabilities is challenging	155(78%)	45(22%)	200 (100%)
There is inadequate administrative support for inclusive classroom.	180(90%)	20(10%)	200 (100%)
There are inadequate material resources as well as human skills to be able to handle learners with disabilities	190(95%)	10(05%)	200 (100%)
there is no functional curriculum in the classroom for learners with disabilities	110(55%)	90(45%)	200 (100%)
I am not competent, so I am not ready to handle children with disabilities in my classroom.	140 (70%)	60(30%)	200 (200%)

Data from Table 4 are the views of teachers about the challenges they face in teaching children with disabilities in inclusive schools. Item 1 on the table stated that it will be difficult to modify the educational curriculum to meet the needs of learners with disabilities. In response to that, 122 participants representing 61% agreed to that and 78 participants representing 39% disagreed to the statement. The data further sought to elicit the views of respondents on their level of experience in handling learners with disabilities; 170 (85%) participants agreed to the statement that "I don't have enough experience in handling learners with disabilities" while 30 (15%) disagreed to the statement. Furthermore, 155 participants, representing 78% agreed that the assessment procedure for learners with disabilities is challenging to them and 45 participants; 22% disagreed. A greater percentage of the participants (190, 90%) agreed that there is

inadequate administrative support for inclusive classrooms whilst 10 (05%) disagreed to the statement.

On the subject of curriculum adaptation and modification, 110 participants representing 55% agreed that there is no functional curriculum in the classroom for learners with disabilities whilst 90 participants representing 45% disagreed that there is no functional curriculum for learners with disabilities. The last item; questionnaire item 7 stated that "I am not competent, so I am not ready to handle children with disabilities in my classroom". A total of 140 respondents (70%) agreed to the statement and 60 respondents (30%) disagreed to the statement.

CHAPTER FIVE

DISCUSSION OF RESULTS AND FINDINGS

5.0 Introduction

This chapter presents the findings and discussions of results for the study. The results are discussed in line with the research questions raised to guide the study.

5.1 The attitudes of teachers towards the inclusion of learners with disabilities

The question one which sought to find out how the attitudes of teachers towards the inclusion of learners with disabilities in regular schools showed that teachers are ready for only learners with mild disabilities in their classrooms as 88% of the respondents agreed to that statement. They also stated that the school learning environment is not appropriate to include learners with disabilities. The findings from this study confirm that of Forlin and Chambers (2011) that the severity of the disability that teachers are required to accommodate within their classroom is inversely associated with their perception towards inclusion. That is, the more severe the child's disability; the less positive their perception is towards inclusion.

Again, teachers were of the view that they have not taken any detailed course of study on learner diversity to be able to handle learners with disabilities (80% agreed as against 20% who disagreed) This revelation agrees with what Westwood and Graham (2003) observed that the inclusion of a compulsory module on diversity in a postgraduate degree promoted an inclusive perception. Pedagogies that combine formal training and planned hands-on experience with people with disabilities have been shown to improve preparedness and positive perceptions towards inclusion. The findings further proves what Campbell et al. (2003) stated that, irrespective of the degree type, trainee teachers had a better understanding of the potential of children with disabilities after completing a unit of study with a strong focus on inclusive education (Campbellet al., 2003).

Furthermore, results from the data indicate that 52% of the respondents agreed that they cannot handle learners with disabilities because they have not been given any in-service training in handling learners with disabilities in the classroom. This result is in line with what Oslon (2003) observed that the general education teachers lacked training and in-services for successful inclusion of students with disabilities in the general classroom.

The results further showed that all the respondents (100%) agreed that they need additional resources as well as human skills to be able to handle learners with disabilities. The findings from the data show that teachers have the perception that they do not have adequate skills to be able to handle learners with disabilities. They are also of the view that there are inadequate material resources that will augment their human skills in educating learners with disabilities. This finding agrees with other research findings that other teachers stressed their concern that, as more students were included, teachers would need additional tools and skills for coping with the social and emotional problems that accompany inclusive schooling (Idol, 1997). Inversely, all the teachers in thus study (100%) disagreed that their school learning environments were well designed and appropriate for them to include learners with disabilities. This falls in line with the findings of McLeskey et al. (2001) who indicated in their survey study that teachers in well-designed inclusive programmes had significantly more positive perspectives and understanding towards inclusion compared to teachers who lacked this experience.

The findings also shows that teachers lacked the confidence to include the learners due to the nature of the learning environment as it agrees with what Center and Ward (1997) indicated that teachers who were anxious about including student with disabilities in

their general education classroom exhibited lack of confidence in their instructional skills and the quality of support services available at the classroom and school levels.

Finally, results from the study show that teachers are of the view that pre-service teacher preparation should be improved in order to improve perception and readiness of the service teacher to handle learners with disabilities. 98% of the respondents agreed that our higher institutions of learning should rather train more teachers in disability issues for them to come and handle learners with disabilities. These findings agree with other researchers who indicated that because positive perception and understanding towards inclusion among teachers appear to be a necessary factor for successful inclusion, teacher education should invest in teacher preparation activities that can help teachers to teach students with disabilities in inclusion settings (Bullough, 1995; Hutchison & Martin, 1999).

In conclusion, the findings from research question one show that teachers agree that learners with mild disabilities should be included in regular classrooms and that there should be an improved in-service training for teachers on disability issues. The findings further revealed that our regular learning environments are not appropriate for the inclusion of learners with disabilities.

5.2 Perception of teachers on the adaptation of the curriculum to meet the needs of diverse learners in inclusive schools

This research question aimed at ascertaining the perception of teachers on the adaptations of the curriculum to meet learner diversity. The findings from the data showed that teachers actually have a positive mindset; that is they believe that both learners with disabilities and those without disabilities can learn together and succeed. This revelation is very crucial for the success of inclusion because the belief of the

teacher is what he puts his commitment into. This is in line with what Hunter-Johnson and Newton (2014) maintained that the voices and opinions of teachers are critical on issues regarding inclusion because teachers are vital to the implementation in their classrooms hence the successful implementation of inclusion depends on teachers' beliefs and perceptions. When teachers actually belief that learners with disabilities can learn in the same environment with their peers without disabilities, then they would be committed and actually work towards its success.

The study however revealed that teachers are of the view that the school learning environment is not responsive to learner diversity including disability friendly. This is critical for the success of learning because the characteristics of each child with special needs vary widely, including in learning. The diversity in each child needs to be accommodated by implementing the curriculum adaptation so that learning can run optimally according to the students' ability (Mirasandi, et. al., 2019). It is also in this vein that Umesh and Laura (2016) opined that just as positive teachers' perceptions foster an easier participation of students. Perceptions towards students with disabilities play a part in their participation in the classroom curriculum with disabilities; the same is true for the perceptions of regularly abled students. When students in the general education body demonstrate positive perceptions towards students with disabilities, it creates a positive and welcoming environment for all (De Laat et al., 2013). Thaver and Lim (2012) further supported this when they postulated that an unfriendly and negative perception from teachers or nondisabled students towards those with disabilities can create a destructive environment resulting in further problems.

On the issue of curriculum adaptations, it was evident that the only means teachers adapt the curriculum to meet the needs of learners with disabilities was by elimination

of curriculum content. They did not modify, or substitute the content to meet learner diversity as opined by Mirasandi, et al. (2019) that the diversity in each child needs to be accommodated by implementing the curriculum adaptation so that the learning can run optimally according to the students' ability. It further shows that the activities of the teachers are not consistent with that of Supardjo (2016) who says that inclusive education curriculum uses a regular curriculum (national curriculum) that is modified according to the stage of development of children with special needs, taking into account the characteristics and level of intelligence of each student. Mirasandi et. al. (2019) postulated that the model curriculum in inclusion for children with special needs can be grouped into four, namely: duplication curriculum, modification curriculum, substitution curriculum and curriculum omission.

The study also revealed that teachers adapt the curriculum objectives, materials and content to suit the needs of learners with disabilities. This finding agrees with what Divine (2013), the curriculum components that need to be adapted to suit the needs of special needs children include objectives, materials or teaching materials, instructional strategies, instructional media, and learning evaluations. The curriculum objectives are intended for the development of demands, conditions, and needs of society and are based on thoughts that are consistent with philosophical values.

It was however shown from the study that teachers do not engage in individual learning planning for learners with disabilities neither do they engage in collaborative planning collaborative objective learning planning with specialists teachers. This revelation again are not consistent with Divine (2013) who opined that based on the learning process, there are two learning strategies, namely (1) Learning planning should be made based on assessment results and made together between classroom teachers and

special teachers in the form of individual learning programmes, (2) Implementation of learning prioritizes cooperative and participatory learning methods, the same opportunities as other students, are shared responsibly and implemented collaboratively between special teachers and classroom teachers, and by using diverse media, resources, and environments with circumstances.

The study again revealed that teachers have no right programme for learners with disabilities who have sub-average intellectual functioning. They again stated that there are no adequate material resources for them to accommodate the diversity of learners with disabilities in their instructions. The implementation of inclusive education is not without challenges which include but not limited to a difficulty in harmonizing the regular school service standards that have been running and the variation in the learning needs of children with disabilities; school have not been able to provide the right program for children with special needs with conditions of intelligence below average; there is no evaluation system learning outcomes, both normative and summative appropriate to the needs of children with special needs; the lack of learning resources and facilities that accommodate the mobility and learning needs of children with disabilities; not all regular teachers have the competence to provide children with special needs services and the lack of special teachers in inclusive schools.

Finally, the study again revealed that teachers have little or no knowledge in the use of differentiated instructions and flexing grouping of learners as well as the importance of UDL in instruction. It was revealed that teachers do not employ these strategies in their curriculum adaptations in accommodating learners with disabilities. It therefore means that learners will not the benefit from what these theories of learning brings into the academic development of their learners as stated by Tomlinson (1999) that practices

such as differentiated instruction and flexible grouping can effectively address the learning of all students. Lowrey, Hollingshead, Howery, and Bishop, (2017) also supported this when they opined that in addition, Universal Design for Learning (UDL) offers a pathway for educators to intentionally plan for and deliver instruction and assessment across a wide array of learners.

In conclusion, the study revealed that teachers have positive perception with a positive mindset that learners with disabilities can equally succeed in an inclusive classroom. However, they demonstrated little knowledge on how to adequately modify the curriculum to meet learner diversity. It was also revealed that the entire lea ring environment was not adequately responsive to learner diversity which could make the success of the curriculum challenging.

5.3 Views of teachers on the appropriateness of the environment in the implementation of inclusive education

Research question three aimed at gathering the views of teachers in Kwahu East District on the appropriateness of the inclusive learning environments in their schools towards inclusive education. First and foremost, it was revealed from the study that learners with disabilities cannot succeed in the learning environment because there are existing environmental barriers that make it difficult for such learners to fully participate in the learning environment. This confirms the statement by UNESCO (1994), that any child may experience a special need during the course of his educational years and as a result, some children feel 'left-outs' and never enter school or enter only for a few years and, as repeaters, or become 'drop-outs' or 'pushed-outs', without their needs having been met. Lindsey (2007) and Norwich (2008) again supported this statement by UNESCO when they opined that these children are a vivid illustration of the failure of schools to teach rather than their own failure to learn.

The study again showed that there are social segregation and discrimination between learners with disabilities and their non-disabled counterparts in the learning environment which could mean that the participation of learners with disabilities in academic and other social activities will be limited because they do not feel they belonged to the entire social group. Singh (n.d.) confirmed this when he stated that the geographical and social segregation of students with 'disabilities', from their 'non-disabled' peers, in learning and development, is further a failure of meaningfully integrating students in mainstream schools.

It was again revealed that the participation of learners with disabilities is limited in the learning environments because of existing environmental barriers that impede learners with disabilities from fully participating. Majority of the respondents agreed that the environment limits the participation of learners with disabilities in the environment. This confirms what Lang (2001) stated that where if the environment is designed for the full range of human functioning and incorporates appropriate accommodations and supports, then individuals with functional limitations would not be disabled' and can actively participate in the society.

Moreover, teachers in these schools saw that the only intervention needed for the successful participation of the learner with a disability is on the learner only and not the environment. This revelation is inconsistent with what Lang (2001) noted that the interventions, to be inclusive, should therefore not only be at the individual level, like medical rehabilitation, but also at the societal level, with provision of necessary support services, a universal design to make infrastructure more accessible, and a change in attitude and perception regarding disability; promoting inclusive education systems and community awareness programs to combat stigma. Studies have however

stipulated the importance of adapting the environment to make it responsive to learner diversity. The use of adaptations especially in the environment is associated with a range of positive characteristics, including: higher student engagement, fewer student competing behaviors, and less teacher time dedicated to classroom management (Lee et al., 2010). Curricular and environment adaptations have also been found to improve student on-task behaviour and work-production (Kern et al., 2001).

Furthermore, the data revealed that there are inadequate assistive technology devices that would augment the handicapping conditions for learners with disabilities. Research has however shown the importance of assistive technology to the independent learning life of the disabled child. It therefore means that the lack of assistive devices for learners with disabilities in these classrooms may result in limited academic and social participation as Smith et al. (2005) revealed that technology serves in bridging this gap by 'assisting' in the practice of educating children in the same classroom, including children with physical, mental and developmental disabilities; helping them to learn the material in a way that they can understand, by eliminating barriers that had been preventing them from being at the same level as their peers. Hern´andez (2003) also confirms what Smith et al. (2005) opined when he stated that offering practical tools for application of the principles of cognitive theory to teaching and learning, assistive technology connects a student's cognitive abilities to an educational opportunity that may not be accessible due to a disability; like a student facing difficulty in decoding text can make use of a text-to-speech screen reader as a 'bridge' between the written text and the ability to process the information aurally and cognitively; while a student who has difficulty sequencing thoughts in text can use graphic outlining software as a bridge to visual processing skills.

The results from the study further revealed that there are inadequate support services for general curriculum teachers in the inclusive practice processes and this could have a great impact on their perception of the practice. Support, both human and material has a great influence on the environment in which inclusion is practiced. One factor that has consistently been found to be associated with more positive perceptions is the availability of support services at the classroom and the school levels (Clough & Lindsay, 1991).

Finally, the study showed that large class sizes and inadequate instructional materials were other challenges that teachers faced in accommodating learners with disabilities in their classrooms. This finding agrees with what other research works have shown that for us to make inclusion a success, some challenges must be overcome as confirmed by Avramidis et al. (2000) that more often than not, teachers report overcrowded classrooms, insufficient instructional materials (differentiated packages), insufficient time to plan with learning support team, lack of a modified/flexible timetable, inadequately available support from external specialists and lack of regular INSET.

In conclusion, the study revealed that there are environmental barriers that exist in the learning environment which serve as challenges for learners to succeed in the learning outcomes. It showed that apart from the physical barriers, there are also social barriers such as discrimination and segregation among the learners. The study also revealed that teachers report inadequate school support for inclusion as well as large class sizes coupled with inadequate instructional material resources for inclusive education. In summary, teachers therefore see the environment as not responsive enough for learner diversity and inclusivity.

5.4 Challenges teachers face in teaching children with disabilities in inclusive schools in Kwahu East District

From the analysis of the results on the challenges that teachers face in teaching children with disabilities in inclusive schools in the Kwahu East District, it was evident that teachers encountered challenges in the areas of curriculum adaptation and modifications, assessment procedures or processes, material availability and self-competency of the teachers, among others. On the issue of curriculum adaptation and modifications, (61%) of the respondents expressed their views that it will be difficult to modify the educational curriculum to meet the needs of learners with disabilities. These findings from this study aligns with that of Loreman et al., (2007) who stated that some teachers are of the view that educating students with and without disabilities in the same classroom faces some challenges such as modification in the curriculum and instruction, teachers' confidence level, collaboration between the teachers and the school administration, experience in dealing with students with disabilities and assessment and grading practice in an inclusive classroom.

It was again evident from this study that teachers felt they do not have enough experience to handle learners with disabilities. This was shown in the data when 85% of the teachers said they do not prior experience in handling learners with disabilities, so they were not ready to handle children with disabilities in their classrooms. These results from this study confirm that of other researchers such as Kuyini and Desai (2008); Subban and Sharma (2006). In their findings, they stated that possessing previous experience as an inclusive educator appears to positively predispose teachers toward inclusive education (Hodge & Jasma, 2000). It would appear that previous contact with persons with disabilities allows regular education teachers to feel comfortable within the inclusive classrooms. (Kuyini & Desai, 2008; Subban & Sharma, 2006).

The findings further showed that there is inadequate administrative support towards inclusion as the respondents (90%) stated inadequate administrative support as their barrier to inclusion. This revelation is not different from What Idol; Larrivee and Cook stated in their findings that successful implementation of inclusive education demands collaboration between the school administration and the teachers. The administration should be committed in providing the appropriate materials necessary for inclusive practices as this could be a challenge to teachers. Administrative support has also been cited as a significant factor in determining teacher perception towards inclusion, as the teacher feels affirmed if the school principal fosters a positive learning environment for both teachers and students (Idol, 1994; Larrivee & Cook, 1979). It is on this base that Larrivee and Cook (1979) warned that lack of administrative support may lead to lack of teachers' confidence and may feel reluctant to give their best in an inclusive classroom.

The results from the study further showed that teachers lack the confidence to handle learners with disabilities as the data show that 70% of the teachers see themselves as not being competent to handle learners with disability, hence they are not ready to include them in their classrooms. It is in this vein that Sigafoos and Elkins (1994) concluded that mainstream educators generally lacked confidence as they attempted to include students with disabilities in their classes. This may be as a result of lacking proficiency about modifying the regular education curriculum to suit students with individual learning needs. Further, Avramidis et al. (2000) support the view that teachers who perceive themselves as competent inclusive educators often have more positive perception towards inclusive education. The authors also asserted that teachers acquire increased competence as a result of increased training in the field of inclusive education.

In conclusion, the results showed that teachers faced a number of challenges in including learners with disabilities in their classrooms which included the difficulties they face in modifying the educational curriculum, their lack of prior experience in teaching learners with disabilities, inadequate administrative support for inclusion and their lack of confidence in their competency on disability education.

CHAPTER SIX

SUMMARY, CONCLUSIONS AND RECOMMENDATIONS

6.0 Introduction

The purpose of this study was to investigate the perceptions of general education teachers towards inclusion of children with disabilities and special educational needs in basic schools within the Kwahu south District in the Central Region of Ghana. It specially sought the following:

- To determine the attitudes of teachers towards the inclusion of learners with disabilities in regular classrooms in Kwahu East District.
- To find out the perception of teachers in adapting the curriculum to meet the needs of diverse learners in inclusive schools in the Kwahu East District.
- To find out the views of teachers on the appropriateness of the learning environment for all learners in the district.
- To explore the challenges teachers face in teaching children with disabilities in inclusive schools in Kwahu East District

Four (4) research questions were raised to guide the study. The Self-Efficacy Theory was adopted for the study. Quantitative approach using descriptive survey design was adopted for the study. The researcher used the Likert Scale type questionnaire to gather the data from the 200 teachers involved in the study. The questionnaire were analysed using Statistical Package for Social Sciences version 23.0 (IBM SPSS, 23.0), to generate the frequency and simple percentages for each item.

6.1 Summary of Major Findings

The major findings are summarised below:

6.1.1 The perceptions of teachers towards the inclusion of learners with disabilities in regular classrooms

From the findings on research question one which sought to ascertain teachers' attitudes towards the teaching of children with disabilities; the findings indicated that teachers were only ready to teach learners with mild disabilities in their regular classrooms. It also revealed that regular classroom teachers did not have adequate knowledge on learner diversity as the finding showed that there was neither a detailed pre-service nor in-service training course undertaken by the teachers in the district on learner diversity. The results also showed that there are inadequate resources both material and human to augment the little efforts put in by the general classroom teachers on inclusivity. Data from the study also showed that the learning environments in the Kwahu East District were not disability friendly.

6.1.2 The perception of teachers in adapting the curriculum to meet the needs of diverse learners in inclusive schools

On the issue of curriculum adaptations, the data showed that teachers have the firm believe that learners with disabilities can actually succeed in an inclusive classroom provide the learning environment is responsive to the needs of these learner. It however revealed that teachers had a negative perception about the existing state of the learning environment with the view that it is not disability friendly. The study again revealed that the only means of curriculum adaptations that teachers engaged in was content elimination. It was again revealed from the study that teachers did not engage in collaborative lesson planning and individualized content planning with specialists.

Even though the study revealed that teachers modify instructional materials to suit the learning needs of learners with disabilities, it however showed that teachers did not

have the right programme for learners with sub-average intellectual functioning. Finally, the results showed that teachers had little or no knowledge in differentiated instructional planning and Universal Design for Learning (UDL) which makes it the participation of learner diversity challenging.

6.1.3 The views of teachers on the appropriateness of the learning environment for all learners

The results from the research question three showed that teachers are of the view that the existing environmental barriers cannot make the academic outcomes of learners with disabilities a success. The study revealed among other things that there exist social barriers and physical barriers as well which include discrimination, segregation from non-disabled peers, large class sizes as well as inadequate assistive technology devices to assist learners with disabilities to participate fully in the learning environment as their non-disabled peers do. The study again revealed that teachers have the view that overcoming the barriers to learning should not be a modification of the environment, but the intervention on the person with the disability such as medical intervention. The study again showed that there is little or no support both at the school level and the curriculum level to assist the general curriculum teachers to fully implement the curriculum to meet learner diversity.

6.1.4 Challenges teachers face in teaching children with disability in inclusive schools

The results from this study indicated that teachers find it difficult to modify the educational curriculum to meet the learning needs of learners with disabilities. It was again revealed that teachers have little or no prior experience in handling learners with disabilities hence assessment procedures and classroom learning adaptations were challenging. Also, there is inadequate administrative support for inclusive classroom in the district. The results again showed that teachers lacked confidence in handling

learners with disabilities because they saw themselves as not competent on issues of disability. Finally, there are inadequate material resources as well as human resources to be able to handle learners with disabilities.

6.2 Conclusion

The study drew the conclusion that teachers have a positive attitude towards the teaching of learners with disabilities, but there are environmental barriers towards successful inclusion as well little knowledge on the part of the teachers on differentiated planning and assessment.

6.3 Recommendations

Based on the findings from the study, the researcher makes the following suggestions:

1. The Special Education Unit of the Ghana Education Service in the district should organize in-service training and sensitization programmes on issues of inclusivity to influence the negative perceptions of regular teachers in the district towards inclusion.

2. The GES office in the district should organize in-service training workshops for teachers in the district on how to adapt the curriculum to respond to learner diversity; especially on the differentiated planning and assessment and universal design for learning.

3. The Ghana education service in the district should employ more special education teachers to give support to general curriculum teachers in the classrooms.

4. The management of the basic schools in the district should provide adequate instructional material resources to teachers including but not limited to assistive

technology devices to ensure the independent and full participation of learners with disabilities in the classrooms.

REFERENCES

Agbenyega, J. S. (2008). Developing the Understanding of the Influence of School Place on Students' Identity, Pedagogy and Learning, Visually. *International Journal of Whole Schooling*, *4*(2), 52-66.

Ahmad, F. K (2014): "Assistive Provisions for the Education of Students with Learning Disabilities in Delhi Schools." *International Journal of Fundamental and Applied Research*, 2(9). pp.9-16.

Ahmad, Fouzia Khursheed (2015a): "Challenging Exclusion: Issues and Concerns in Inclusive Education in India." Researchpaedia, vol.2, no.1, pp.15-32.

Ahsan, M. T., & Mullick, J. (2013). The journey towards inclusive education in Bangladesh: Lessons learned. *Prospects*, *43*(2), 151-164.

Ainscow, M. (2013). Using research to encourage the development of inclusive practices. In *Making special education inclusive* (pp. 35-47). David Fulton Publishers.

Armstrong, F. & Barton, L. (Eds.). (2007). *Policy, experience and change: Cross-cultural reflections on inclusive education* (Vol. 4). Springer.

Artino, A. R. (2006). Learning online: Motivated to self-regulate. *Academic Exchange Quarterly*, *10*(4), 176-182.

Avramidis, E., & Norwich, B. (2002). Teachers' attitudes towards integration/inclusion: a review of the literature. *European Journal of Special Needs Education*, *17*(2), 129-147.

Avramidis, E., Bayliss, P., & Burden, R. (2000). A survey into mainstream teachers' attitudes towards the inclusion of children with special educational needs in the ordinary school in one local educational authority, *Educational Psychology, 20*, 191-211. doi: 10.1080/713663717

Avramidis, E., Bayliss, P., & Burden, R. (2000). A survey into mainstream teachers' attitudes towards the inclusion of children with special educational needs in the ordinary school in one local education authority. *Educational Psychology*, *20*(2), 191-211.

Avramidis, E., Bayliss, P., & Burden, R. (2000). A survey into mainstream teachers' attitudes towards the inclusion of children with special educational needs in the ordinary school in one local education authority. *Educational Psychology*, *20*(2), 191-211.

Bandura, A. (1977). Self-efficacy: toward a unifying theory of behavioral change. *Psychological Review*, *84*(2), 191.

Bandura, A. (1982). Self-efficacy mechanism in human agency. *American Psychologist*, *37*(2), 122.

Bandura, A. (1986). *Fearful expectations and avoidant actions as coeffects of perceived self-inefficacy.*

Bandura, A. (1999). Social cognitive theory of personality. *The coherence of personality: Social-cognitive bases of consistency, variability, and organization*, 185-241.

Bandura, A., & Barab, P. G. (1973). Processes governing disinhibitory effects through symbolic modeling. *Journal of Abnormal Psychology*, *82*(1), 1.

Bender, W. N., Vail, C. O., & Scott, K. (1995). Teachers attitudes toward increased mainstreaming: Implementing effective instruction for students with learning disabilities. *Journal of Learning Disabilities*, *28*(2), 87-94.

Billingsley, B. S. (2004). Special education teacher retention and attrition: A critical analysis of the research literature. *The Journal of Special Education*, *38*(1), 39-55.

Bines, H., & Lei, P. (2011). Disability and education: The longest road to inclusion. *International Journal of Educational Development*, *31*(5), 419-424.

Bizer, G. Y., Barden, J. C., & Petty, R. E. (2003). Attitudes encyclopedia of cognitive science (pp. 247–253). *Nature*.

Blenk, K., & Fine, D. L. (1995). *Making School Inclusion Work: A Guide to Everyday Practice*. Brookline Books, PO Box 1046, Cambridge, MA 02238-1046.

Boakye-Amponsah, A. (2015). Achieving Quality Education in Ghana: The Spotlight on Primary Education within the Kumasi Metropolis. *Journal of Education and Practice*, *6*(17), 9-22.

Bones, R. & Lambe, J., (2007). The effect of school-based practice on student teachers' attitudes towards inclusive education in Northern Ireland. *Journal of Education for Teaching*, *33*(1), 99-113.

Bornman, J., & Donohue, D. K. (2013). South African teachers' attitudes toward learners with barriers to learning: Attention-deficit and hyperactivity disorder and little or no functional speech. *International Journal of Disability, Development and Education*, *60*(2), 85-104.

Boston, C. (2002). The concept of formative assessment. *Practical Assessment, Research, and Evaluation*, *8*(1), 9.

Brown, S. P. (1996). A meta-analysis and review of organizational research on job involvement. *Psychological Bulletin*, *120*(2), 235.

Burke, K., & Sutherland, C. (2004). Attitudes toward inclusion: Knowledge vs. experience. *Education*, *125*(2).

Buysse, V., & Bailey Jr, D. B. (1993). Behavioral and developmental outcomes in young children with disabilities in integrated and segregated settings: A review of comparative studies. *The Journal of Special Education*, *26*(4), 434-461.

Campbell, C., & Collins, V. L. (2007). Identifying essential topics in general and special education introductory assessment textbooks. *Educational Measurement: Issues and Practice*, *26*(1), 9-18.

Carrington, S. (1999). Inclusion needs a different school culture. *International Journal of Inclusive Education*, *3*(3), 257-268.

Chhabra, S., Srivastava, R., & Srivastava, I. (2010). Inclusive education in Botswana: The perceptions of school teachers. *Journal of Disability Policy Studies*, *20*(4), 219-228.

Clough, P., & Lindsay, G. (1991). *Integration and the support service: Changing roles in special education*. Routledge.

Cook, B.G., M. &. Landrum T.J. (2000). Teachers' attitudes toward their included students with disabilities. *Exceptional Children, 67*, 115–35.

Creswell, J. W. (2010). *Research design: Qualitative, quantitative and mixed methods approach*. Sage Publications, Inc

Creswell, J. W., & Creswell, J. D. (2018). *Research design: Qualitative, quantitative and mixed methods approach* (5th ed). Sage Publications, Inc

Cross, A. F., Traub, E. K., Hutter-Pishgahi, L., & Shelton, G. (2004). Elements of Successful Inclusion for Children with Significant Disabilities. *Topics in Early Childhood Special Education, 24*(3), 169-183.

Daane, C. J., Beirne-Smith, M., & Latham, D. (2000). Administrators 'and teachers' perceptions of the collaborative efforts of inclusion in the elementary grades. *Education*, *121*(2).

De Boer, A., Pijl, S. J., & Minnaert, A. (2011). Regular primary schoolteachers' attitudes towards inclusive education: A review of the literature. *International Journal of Inclusive Education*, *15*(3), 331-353.

De Laat, S., Frerikseп, E., & Vervloed, M. P. (2013). Attitudes of children and adolescents toward persons who are deaf, blind, paralyzed or intellectually disabled. *Research in Developmental Disabilities*, *34*(2), 855-863.

Deku, P., & Mensah, A. K. (2004). Inclusive education: the Ghanaian perspective. *West African Journal of Research and Development in Education*, *11*(1), 8-15.

Deku, P., & Vanderpuye, I. (2008). Assessing instructional strategies: A case study of selected regular schools in Ghana. Implication for Inclusive education. *African Journal of Special Educational Needs*, *5*(4), 67-78.

Deppeler, J. (2012). Developing inclusive practices: Innovation through collaboration. *What works in inclusion*, 125-138.

Downing, J. E., & Peckham-Hardin, K. D. (2007). Inclusive education: What makes it a good education for students with moderate to

severe disabilities? *Research and Practice for Persons with Severe Disabilities*, *32*, 16-30. doi:10.2511/rpsd.32.1.16

Drame, E., & Kamphoff, K. (2014). Perceptions of disability and access to inclusive education in West Africa: A comparative case study in Dakar, Senegal. *International Journal of Special Education (IJSE)*, *29*(3).

Dymond, S. K., & Russell, D. L. (2004). Impact of grade and disability on the instructional context of inclusive classrooms. *Education and Training in Developmental Disabilities*, *39*, 127 140.

Ellins, J., & Porter, J. (2005). Departmental differences in attitudes to special educational needs in the secondary school. *British Journal of Special Education*, *32*(4), 188-195.

Eloff, I., Swart, E., & Engelbrecht, P. (2002). Including a learner with physical disabilities: stressful for teachers?. *Koers: Bulletin for Christian Scholarship= Koers: Bulletin vir Christelike Wetenskap*, *67*(1), 77-99.

Engelbrecht, P. (2006). The implementation of inclusive education in South Africa after ten years of democracy. *European Journal of Psychology of Education*, *21*(3), 253-264.

Engelbrecht, P. (2006). The implementation of inclusive education in South Africa after ten years of democracy. *European Journal of Psychology of Education*, *21*(3), 253-264.

Engelbrecht, P., Oswald, M., Swart, E., & Eloff, I. (2003). Including learners with intellectual disabilities: Stressful for teachers?. *International Journal of Disability, Development and Education*, *50*(3), 293-308.

Farell, T. (2000). How to Develop a Group Curriculum: Developing an Exercise Programme for Overweight Adults. Nupponen R, Laukkanen R. Patient Education and Counseling. 1998; 33: S77-S85. *Journal of Physical Therapy Education*, *14*(1), 53.

Fisher, D., & Frey, N. (2001). Access to the core curriculum: Critical ingredients for student success. *Remedial and Special Education*, *22*, 148-157. doi:10.1177/074193250102200303

Florian, L. (2008). Inclusion: special or inclusive education: future trends. *British Journal of Special Education*, *35*(4), 202-208.

Foreman, C. H. (2011). *The promise and peril of environmental justice*. Brookings Institution Press.

Forlin, C. (1995). Educators' beliefs about inclusive practices in Western Australia. *British Journal of Special Education*, *22*(4), 179-185.

Forlin, C. (2005). Teacher education for inclusion. In R. Rose (Ed.) 155-169). Routledge

Forlin, C. (2006). Inclusive education in Australia ten years after Salamanca. *European Journal of Psychology of Education*, *21*(3), 265-277.

Forlin, C., & Chambers, D. (2011). Teacher preparation for inclusive education: Increasing knowledge but raising concerns. *Asia-Pacific Journal of Teacher Education*, *39*(1), 17-32.

Forlin, C., Loreman, T., Sharma, U., & Earle, C. (2009). Demographic differences in changing pre-service teachers' attitudes, sentiments and concerns about inclusive education. *International Journal of Inclusive Education*, *13*(2), 195-209.

Friend, M. (2008). Co-teaching: A simple solution that isn't simple after all. *Journal of Curriculum and Instruction*, *2*(2), 9-19.

Gal, Eynat., Schreur, Naomi. and Engel-Yeger, Batya. (2010): Inclusion of Children with Disabilities: Teachers' Attitudes and Requirements for Environmental Accommodations. *International Journal of Special Education* vol. 25 no 2.

Gameros, P. (1995). The visionary principal and inclusion of students with disabilities. *Nassp Bulletin*, *79*(568), 15-17.

Giangreco, M. F., Dennis, R., Cloninger, C., Edelman, S., & Schattman, R. (1993). "I've counted Jon": Transformational experiences of teachers educating students with disabilities. *Exceptional Children, 59,* 359-372. doi:10.1177/001440299305900408

Goddard, M. (2004): "Access through technology", *Library Journal*, vol.2, Spring, pp.2-6.

Good, T. S. L. (1992). Compliant cognition: The misalliance of management and instructional goals in current school reform. *Educational Researcher*, *21*(3), 4-17.

Hay, J. F., Smit, J., & Paulsen, M. (2001). Teacher preparedness for inclusive education. *South African Journal of Education*, *21*(4), 213-218.

Hedeen, D. L., & Ayres, B. J. (2002). You want me to teach him to read? *Journal of Disability Policy Studies, 13,* 180- 189. doi:10.1177/10442073020130030601

Hern´andez, Ana (2003). Making Content Instruction Accessible for English Language Learners. English Learners: Reaching the Highest Level of English Literacy – 2003 International Reading Association.

Higgins, S., Hall, E., Wall, K., Woolner, P., & McCaughey, C. (2005). *The impact of school environments: A literature review.* Design Council.

Hom, P. W., & Kinicki, A. J. (2001). Toward a greater understanding of how dissatisfaction drives employee turnover. *Academy of Management Journal*, *44*(5), 975-987.

Idol, L. (2006). Toward inclusion of special education students in general education. *Remedial & Special Education, 27*(2), 77-94.

Individuals with Disabilities Education Improvement Act (IDEA) Amendments of 2004, Pub. L No. 108-446, 108th Congress (2004).

Janney, R. E., & Snell, M. E. (2006). Modifying schoolwork in inclusive classrooms. *Theory into Practice, 45*, 215-223. doi:10.1207/s15430421tipp4503_3

Johnstone, C. J., &. Chapman, D. W. (2009). Contributions and constraints to the implementation of inclusive education in Lesotho. *International Journal of Disability, Development, and Education, 56*, 131-148. doi: 10.1080/10349120902868582

Kauffman, J. M., & Landrum, T. J. (2009). Politics, civil rights, and disproportional identification of students with emotional and behavioral disorders. *Exceptionality*, *17*(4), 177-188.

Kern, L., Delaney, B., Clarke, S., Dunlap, G., & Childs, K. (2001). Improving the classroom behavior of students with emotional behavioral disorders using individualized curricular modifications. *Journal of Emotional and Behavioral Disorders, 9*(4), 239-247.

Klecker, B. M. (2002). *Formative classroom assessment using cooperative groups: Vygotsky and random assignment.*

Kozleski, E. B., Yu, T., Satter, A. L., Francis, G. L., & Haines, S. J. (2015). A never ending journey: Inclusive education is a principle of practice, not an end game. *Research and Practice for Persons with Severe Disabilities, 40*, 211-226. doi:10.1177/1540796915600717

Kurth, J. A., & Keegan, L. (2014). Development and use of curricular adaptations for students receiving special education service. *Journal of Special Education, 48*, 191-203. doi:10.1177/0022466912464782

Kurth, J. A., Lyon, K. L., & Shogren, K. A. (2015). Supporting students with severe disabilities in inclusive schools: A descriptive account from schools implementing inclusive practices. *Research and Practice for Persons with Severe Disabilities, 40*, 261-274. doi:10.1177/1540796915594160

Kurth, J., Gross, M., Lovinger, S., & Catalano, T. (2012). Grading students with significant disabilities in inclusive settings: Teacher perspectives. *The Journal of International Association of Special Education, 12*, 41-57.

Kusi, H. (2012). *Doing qualitative research: A guide for researchers.* Emmpong Press.

Kuyini, A. B., & Desai, I. (2008). Providing Instruction to Students with Special Needs in Inclusive Classrooms in Ghana: Issues and Challenges. *International Journal of Whole Schooling*, *4*(1), 22-39.

Lackney, J. A., & Jacobs, P. J. (2002). *Teachers as Placemakers: Investigating Teachers' Use of the Physical Learning Environment in Instructional Design*.

Lamorey, S., & Bricker, D. D. (1993). Integrated programs: Effects on young children and their parents. *Integrating young children with disabilities into community programs: Ecological perspectives on research and implementation*, 249-270.

Lang, R. (2001). *"The Development and Critique of the Social Model of Disability*". Overseas Development Group. University of East Anglia.

Larrivee, B., & Cook, L. (1979). Mainstreaming: A study of the variables affecting teacher attitude. *The Journal of Special Education*, *13*(3), 315-324.

Lee, S. H., Wehmeyer, M. L., Soukup, J. H., & Palmer, S. B. (2010). Impact of curricula modifications on access to the general education curriculum for students with disabilities. *Exceptional Children, 76,* 213-233. doi:10.1177/001440291007600205

Leeman, Y., & Volman, M. (2001). Inclusive education: recipe book or quest. On diversity in the classroom and educational research. *International Journal of Inclusive Education*, *5*(4), 367-379.

LeRoy, B., & Simpson, C. (1996). Improving student outcomes through inclusive education. *Support for Learning*, *11*(1), 32-36.

Lewis, R. B., & Doorlag, D. H. (1995). *Teaching special students in the mainstream*. Macmillan College.

Leyser, Y., & Kirk, R. (2004). Evaluating inclusion: An examination of parent views and factors influencing their perspectives. *International Journal of Disability, Development and Education*, *51*(3), 271-285.

Lindqvist, G., & Nilholm, C. (2013). Making schools inclusive? Educational leaders' views on how to work with children in need of special support. *International Journal of Inclusive Education*, *17*(1), 95-110.

Lindsey, G. (2007): "Educational Psychology and the effectiveness of inclusive education/ mainstreaming." *British Journal of Educational Psychology* vol.77, no.1, 1-24.

Lomofsky, L., & Lazarus, S. (2001). South Africa: First steps in the development of an inclusive education system. *Cambridge Journal of Education*, *31*(3), 303-317.

Loreman, T., Earle, C., Sharma, U., & Forlin, C. (2007). The Development of an Instrument for Measuring Pre-Service Teachers' Sentiments, Attitudes, and Concerns about Inclusive Education. *International Journal of Special Education*, *22*(1), 150-159.

Lowrey, K. A., Hollingshead, A., Howery, K., & Bishop, J. B. (2017). More than one way: Stories of UDL and inclusive classrooms. *Research and Practice for Persons with Severe Disabilities*, *42*, 225-242. doi:10.1177/1540796917711668

Mastropieri, M. A., & Scruggs, T. E. (2001). Promoting inclusion in secondary classrooms. *Learning Disability Quarterly*, *24*(4), 265-274.

McDonnell, J., Mathot-Buckner, C., Thorsen, N., & Fister, S. (2001). Supporting the inclusion of students with moderate and severe disabilities in junior high school general education classes: The effects of classwide peer tutoring, multi-element curriculum, and accommodations. *Education & Treatment of Children*, *24*, 141-160

McLeskey, J., Waldron, N. L., & Reed, L. (2014). A case study of a highly effective, inclusionary elementary school. *The Journal of Special Education*, *48*, 59-70. doi:10.1177/0022466912440455

Michailakis, D., & Reich, W. (2009). Dilemmas of inclusive education. *Alter*, *3*(1), 24-44.

Miles, S., & Singal, N. (2010). The education for all and inclusive education debate: Conflict, contradiction or opportunity?. *International Journal of Inclusive Education*, *14*(1), 1-15.

Miller, K. J., & Savage, L. B. (1995). *Including General Educators in Inclusion.*

Minke, K. M., Bear, G. G., Deemer, S. A., & Griffin, S. M. (1996). Teachers' experiences with inclusive classrooms: Implications for special education reform. *The Journal of Special Education*, *30*(2), 152-186.

Mirasandi, et. al. Curriculum Adaptation in Learning Student with Special Needs at Inclusive Schools Surakarta City.*Indonesian Journal of Disability Studies (IJDS).*2019: Vol. 6(1): PP 42- 46.

Nel, N., Müller, H., & Rheeders, E. (2011). Support services within inclusive education in Gauteng: The necessity and efficiency of support. *Mevlana International Journal of Education (MIJE)*, *1*(1), 38-53.

Nguyet, D. T. (2010). *How-to guide: Preparing teachers for inclusive education*. Catholic Relief Services.

Nind, M., & Wearmouth, J. (2006). Including children with special educational needs in mainstream classrooms: implications for pedagogy from a systematic review. *Journal of Research in Special Educational Needs*, *6*(3), 116-124.

Norwich, B. (2008): "Dilemma of difference, inclusion and disability: International Perspectives on Placement." *European Journal of Special Needs Education* vol. 23, no. 4, pp. 287-304.

Odom, S. L., & Diamond, K. E. (1998). Inclusion of young children with special needs in early childhood education: The research base. *Early Childhood Research Quarterly*, *13*(1), 3-25.

Odongo, G., & Davidson, R. (2016). Examining the Attitudes and Concerns of the Kenyan Teachers toward the Inclusion of Children with Disabilities in the General Education Classroom: A Mixed Methods Study. *International Journal of Special Education*, *31*(2), n2.

Olson, A., Leko, M. M., & Roberts, C. A. (2016). Providing students with severe disabilities access to the general education curriculum. *Research and Practice for Persons with Severe Disabilities*, *41*, 143-157. doi:10.1177/1540796916651975

Pearce, W. B. (2009). *Making social worlds: A communication perspective*. John Wiley & Sons.

Peckham-Hardin, K. D. (2007). Inclusive education: What makes it a good education for students with moderate to severe disabilities?. *Research and Practice for Persons with Severe Disabilities*, *32*(1), 16-30.

Petty, R. E. (2012). Technology Access in the Workplace and Higher Education for Persons with Visual Impairments: An Examination of Barriers and Discussion of Solutions. Independent Living Research Utilization at TIRR: Houston, Texas.

Polat, F. (2011). Inclusion in education: A step towards social justice. *International Journal of Educational Development*, *31*(1), 50-58.

Praisner, C.L. (2003): "Attitudes of elementary school principals toward the inclusion of students with disabilities". *Exceptional Children* vol.69, no.2, 135-146.

Ramchand, B. & Dummugudem. (2014): "Inclusion Education as Solution to Barriers of CWSN and Answer for their Success." *International Journal of Humanities and Social Science Invention* vol.3 no. 8.

Reed, P. & Bowser, G. (2005). "Assistive technologies and the IEP" in Edyburn, D., Higgins, K., Boone, R. (Eds.) *Handbook of Special Education Technology Research and Practice.* Knowledge by Design Inc. Whitefish bay.

Ross-Hill, R. (2009). Teacher attitude towards inclusion practices and special needs students. *Journal of Research in Special Educational Needs*, *9*(3), 188-198.

Ryndak, D. L., Morrison, A. P., & Sommerstein, L. (1999). Literacy before and after inclusion in general education settings: A case study. *Journal of the Association for Persons with Severe Handicaps, 24*, 5-22.

Sapon-Shevin, M. (1996). Full inclusion as disclosing tablet: Revealing the flaws in our present system. *Theory into Practice*, *35*(1), 35-41.

Scruggs, T. E., & Mastropieri, M. A. (1996). Teacher perceptions of mainstreaming/inclusion, 1958–1995: A research synthesis. *Exceptional Children*, *63*(1), 59-74.

Shakespeare, T. & N. Watson (1997): "Defending the Social Model." *Disability and Society*, vol.12, no 2, pp. 293-300.

Shari, M., & Vranda, M. N. (2016). Attitude of primary school teachers towards children with learning disabilities. *Journal of Indian Association for Child and Adolescent Mental Health-ISSN 0973-1342*, *12*(4), 323-335.

Sharma, U., Forlin, C., Deppeler, J., & Yang, G. X. (2013). Reforming teacher education for inclusion in developing countries in the Asia Pacific region. *Asian Journal of Inclusive Education*, *1*(1), 3-16.

Sigafoos, J., & Elkins, J. (1994). Concerns of teachers about the integration of children with physical versus multiple disabilities. *Australasian Journal of Special Education*, *18*(2), 50-56.

Simpson, R. L. & Myles, B. S. (1999). Educators' assessment accommodation preferences for students with autism. *Focus on Autism and Other Developmental Disabilities*, *14*(4), 212- 219.

Singh, V. (n.d). Access to Equality in Education for Children with Disability through Inclusive Education. Available at: wikieducator.org/images/2/24/ SJ Vandana Singh.pdf

Skaalvik, E. M., & Skaalvik, S. (2007). Dimensions of teacher self-efficacy and relations with strain factors, perceived collective teacher efficacy, and teacher burnout. *Journal of Educational Psychology*, *99*(3), 611.

Smith, R.W., Austin, D.R., Kennedy, D.W., Lee, Y., and Hutchinson, P. (2005). Inclusive and special recreation: Opportunities for persons with disabilities (5th ed.). McGraw Hill.

Subban, P., & Sharma, U. (2006). Primary school teachers' perceptions of inclusive education in Victoria, Australia. *International Journal of Special Education, 21*, 42-52.

Supardjo. (2016). *Pengelolaan Pembelajaran Anak berkebutuhan Khusus di Sekolah DasarPenyelenggara Pendidikan Inklusif Sekolah Dasar Negeri III Giriwono Wonogiri*. Surakarta: Unversitas Muhammadiyah Surakarta.

Terzi, L. (2008). *Justice and equality in education: A capability perspective on disability and special needs.* Continuum International.

Thomazet, S. (2009). From integration to inclusive education: Does changing the terms improve practice? *International Journal of Inclusive Education*, *13*(6), 553-563.

Tomlinson, C. A. (1999). Mapping a route toward a differentiated instruction. *Educational Leadership*, *57*, 12-17.

Tschannen-Moran, M., Hoy, A. W., & Hoy, W. K. (1998). Teacher efficacy: Its meaning and measure. *Review of Educational Research*, *68*(2), 202-248.

UNESCO (1994). *The UNESCO Salamanca Statement and Framework for Action on Special Needs Education*. UNESCO

Vaughn, B. E. (1999). *Attachment and temperament: Redundant, independent, or interacting influences on interpersonal adaptation and personality development.*

Vidovich, D., & Lombard, T. P. (1998). Parents', teachers' and administrators' perceptions of the process of inclusion. *Educational Research Quarterly*, *21*(3), 41.

Wakeman, S., Karvonen, M., & Ahumada, A. (2013). Changing instruction to increase achievement for students with moderate to severe intellectual disabilities. *Teaching Exceptional Children*, *46*(2), 6-13.

Wehmeyer, M. L., Lattin, D., Lapp-Rincker, G., & Agran, M. (2003). Access to the general curriculum of middle school students with mental retardation: An observational study. *Remedial and Special Education*, *24*, 262-278. doi:10.1177/07419325030240050201

Westwood, P., & Graham, L. (2003). Inclusion of students with special needs: Benefits and obstacles perceived by teachers in New South Wales and South Australia. *Australian Journal of Learning Difficulties*, *8*(1), 3-15.

WHO (2009) "Assistive devices/technologies", Available at: http://www.who.int/disabilities/technology/en/

Wigle, S. E., & Wilcox, D. J. (1997). Teacher and administrator attitudes toward full inclusion in rural mid-America. *Rural Special Education Quarterly*, *16*(1), 3-7.

Wolery, M. (2000). Commentary: The environment as a source of variability: Implications for research with individuals who have autism. *Journal of Autism and Developmental Disorders*, *30*(5), 379.

World Bank Group. (2013). *Global financial development report 2014: Financial inclusion* (Vol.2). World Bank Publications.

Yeibyo, T. T. (2012). *Teachers' Understanding of Inclusive Education in One Elementary School in Oslo* (Master's thesis).

Yin, R. K. (2014). *Case study research: Design and methods*. (5th ed) Thousand Oaks.

Zoniou-Sideri, A., & Vlachou, A. (2006). Greek teachers' belief systems about disability and inclusive education. *International Journal of Inclusive Education*, *10*(4), 379-394.

APPENDIX A

DEPARTMENT OF SPECIAL EDUCATION

UNIVERSITY OF EDUCATION, WINNEBA

(UEW)

OFFICE OF THE HEAD OF DEPARTMENT

8TH February, 2022

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LETTER OF INTRODUCTION

I write to introduce to you, Mr. Felix Kudzo Mawuena, an M.Phil student of Department of Special Education of the University of Education, Winneba, with registration number 202114201.

He is currently working on the "*Perception of teachers towards the implementation of inclusive education in the Kwahu east of the Eastern region of Ghana"*.

I should be grateful if permission would be granted him to enable him carry out his studies in your institution.

Thank you.

Dr. Daniel Fobi PhD (ToD), MPhil, BEd (SPEd)
Lecturer in deaf education and inclusive education
Graduate programmes coordinator
Department of Special Education
University of Education
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APPENDIX B

QUESTIONAIRE FOR BASIC SCHOOL TEACHERS IN KWAHU EAST DISTRICT OF EASTERN REGION

Dear respondent,

I am currently carrying out a study for the purpose of writing a thesis as a requirement for the award of Mphil in Special Education at University of Education, Winneba. The topic for the study is Perception of Teachers on the Implementation of Inclusive Education in the Kwahu East District of the Eastern Region. You have been selected to participate in this study due to the importance of your information. The information you supply will remain strictly confidential. Please feel free and answer all the questions truthfully. Thank you very much.

SECTION A: Teachers' Perceptions on the Inclusion of Children with Disabilities

To what extent do you agree or disagree on the following? Tick as appropriate (✓).
Strongly Agree (SA), Agree (A), Disagree (D) Strongly Disagree

Statements	**SA**	**A**	**D**	**SD**
1. Only learners with mild disabilities should be brought to inclusive classrooms.				
2. I have not taken any detailed course on learner diversity to be able to handle learners with disabilities.				
3. There will be greater challenges in handling learners with disabilities in the general classroom.				
4. I don't have any training or in service training in handling learners with disabilities in the classroom.				
5. I need additional material resources as well as human skills to be able to handle learners with disabilities.				
6. My school environment is well designed and appropriate for me to include learners with disabilities in my classroom.				
7. Our higher institutions should rather train more teachers in disability issues for them to come and handle learners with disabilities.				

SECTION B: Teachers' Perception on Curriculum Adaptation in Ensuring Learners Participation

To what extent do you agree or disagree on the following? Tick as appropriate (✓).**Strongly Agree (SA), Agree (A), Disagree (D) Strongly Disagree**

Statement	SA	A	D	SD
8. I am positive that both learners with disabilities and those without disabilities can learn together and succeed.				
9. The school learning environment is responsive to all learners				
10. I sometimes substitute the curriculum content so as to allow the participation of learners with disabilities.				
11. I adapt my curriculum to meet learner diversity.				
12. Learners with disabilities are exempt from participating in certain subjects.				
13. Learners with disabilities can learn the same content with those without disabilities provided there are no environmental barriers.				
14. I adapt the curriculum objectives, teaching materials, instructional strategies, instructional media, and learning evaluations to suit the needs of special needs children.				
15. Learning planning is made together between the classroom teacher and the specialist teacher in the form of individual learning programs.				
16. The learning environment has not been able to provide the right program for children with special needs with conditions of intelligence below average.				
17. The lack of learning resources and facilities that accommodate the mobility and learning needs of children with disabilities makes inclusion difficult.				
18. Not all regular teachers have the competence to provide children with special services.				
19. There are inadequate special education teachers to augment the effort of the general curriculum teachers.				
20. I employ differentiated instruction and flexible grouping to address the learning needs of all students.				
21. I use Universal Design for Learning (UDL) to intentionally plan for and deliver instruction and assessment across a wide array of learners				
22. My aim is to ensure that learners with disabilities benefit from the psychosocial influences of inclusion rather than the actual academic learning				

SECTION C: Teachers' Views on Inclusive Learning Environments

To what extent do you agree or disagree on the following? Tick as appropriate (✓).

Strongly Agree (SA), Agree (A), Disagree (D) Strongly Disagree

Statement	SA	A	D	SD
23. Some learners cannot succeed academically because of environmental barriers.				
24. Inclusion is difficult because there is social segregation between students with disabilities and those without disabilities.				
25. The design of the learning environment limits the participation of learners of disabilities in the learning environment.				
26. The only intervention that is needed for inclusion in based on the individual with disability (e.g. Medical intervention)				
27. My learners with disabilities learn better and participate more when I adapt the learning environment to suit them.				
28. Students with disabilities have access to assistive technology that helps them to overcome some environment barriers.				
29. There is inadequate support services both in the classroom and the school level for the inclusion of learners with disabilities.				
30. Large class sizes serve as a challenge for me to attend to the individual needs of the learners.				
31. Insufficient instructional materials and insufficient time to plan with learning support team makes participation limited for learners with SEN.				
32. Lack of a modified or flexible timetable for learners with disabilities in the general curriculum makes it difficult to engage in intervention processes.				

SECTION D: Challenges Teachers Face in Teaching Children with Disability in Inclusive Schools

To what extent do you agree or disagree on the following? Tick as appropriate (✓).

Strongly Agree (SA), Agree (A), Disagree (D) Strongly Disagree

Statement	SA	A	D	SD
33. It will be difficult to modify the educational curriculum to meet the needs of learners with disabilities				
34. I don't have enough experience in handling learners with disabilities				
35. The assessment procedure for learners with disabilities is challenging				
36. There is inadequate administrative support for inclusive classroom.				
37. There are inadequate material resources as well as human skills to be able to handle learners with disabilities				
38. There is no functional curriculum in the classroom for learners with disabilities				
39. I am not competent, so I am not ready to handle children with disabilities in my classroom.				