

# THE ACQUISITION OF ATTITUDES AND PROFESSIONAL SKILLS

### FOR GLOBAL CITIZENSHIP BY BILINGUAL STUDENTS

THROUGH SECOND LANGUAGE LEARNING

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#### Abstract

This research is based on arguments that second language learning helps build up the degree of the acquisition of positive attitudes and professional skills for global citizenship in bilingual students studying in a bilingual education provider with a minimum of six years. This study aimed at investigating to what degree bilingual students have acquired attitudes and professional skills for global citizenship through the learning of a second language at a bilingual education provider in Thailand.

Purposive sampling and quantitative research methods were used in order to test two hypotheses, which were cross checked by qualitative interview data. Both quantitative and qualitative data revealed positive findings, in that the 158 participants acquired attitudes and professional skills for global citizenship at a very high level and that the samples were representative of the population in the present study. This study contributes to the growing body of knowledge on the advantages of second language learning in a formal bilingual setting, that are attitudes and professional skills for global citizenship acquired by bilingual students. It is recommended that this study be replicated in different social and academic contexts.

(Total 148 pages)

Keywords: Attitudes, Professional Skills, Global Citizenship, Bilingual Students, Second Language learning.

Student's Signature ...... Thesis Advisor's Signature .....

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# Abbreviations

Abbreviation	Meaning
ACT	Adaptive Control of Thought
ESL	English as a Second Language
IB	International Baccalaureate
IBO	International Baccalaureate Organization
IBDP	International Baccalaureate Diploma
	Programme
ICT	Information and Communication
	Technology
L1	Language 1
L2	Language 2
МОЕ	Ministry of Education
MYP	Middle Years Programme
РҮР	Primary Years Programme
UNESCO	United Nations Educational Scientific
	And Culture Organization
SL 🕰	Second Language
SLL 72	Second Language Learning
SLL THE TAKES	Item Objective Congruence
SD 'नहार्	Standard Deviation

### **CHAPTER 1**

#### **INTRODUCTION**

This chapter unveils the background of the study. It describes vividly the objectives of the research. The hypotheses, the conceptual framework, and the key terms are clearly defined.

### **1.1 Background and Significance of the Research Problem**

Globalization has led to the necessity of bilingualism because the world is now conceived as a global village which is interconnected. With advancement in transportation, communication, the media, internet and technology, the world is basically connected and everyone in the world is linked (Dalglish, 2006). As a result of globalization, cultural barriers are broken, information is accessible, communications across continents are faster, and trades between individuals and countries are better enhanced. In effect, globalization defines the world where people live in, and it has modified the way in which citizens identify themselves (Ariely, 2011; Arnett, 2002). Unavoidably, the influence of globalization has led people from seeing themselves as just citizens of one nation to being citizens of the world or global citizens.

While globalization hastens an unhindered flow of persons, exchange of ideas and products between nations, it creates avenues for individuals to become global citizens. A global citizen is proactive from the community level in collaborating with others for the sole purpose of making the world a better and more sustainable place to live in. (Oxfam, 2006). He or she takes an active role in their community, and works with others to make the planet more equal, fair and sustainable. To be effective global citizens, young people need more flexibility, creativity and pro-activeness. They need to develop critical thinking in order to handle issues and make better decisions as well as communicate ideas efficiently. They also need to understand how to work better in groups and teams (Oxfam, 2006). These skills and attributes are also increasingly recognized as being essentially necessary to succeed in other areas of life in the 21st century, including many workplaces. These skills and qualities characterize the concept of global citizenship.

Learning a second language is an important tool for global citizenship. Global citizenship explains the idea that one's identity transcends geographical borders (Israel, 2012). The idea and characteristics of global citizenship implied by UNESCO (2014), is an ability to communicate effectively across borders in a spirit of equality and reciprocity. Such an ability allows learners to learn firsthand and directly about the lives of others and the challenges and opportunities they face. Consequently, bilingual competence is a necessary prerequisite for many of the other requirements of global citizenship, since it alone allows for such equality and reciprocity (UNESCO, 2014).

Learning foreign languages and appreciating linguistic and cultural differences is also an essential part of global citizenship which requires appreciation and management of linguistic diversity. The reason is that most of the world's citizens speak more than one language, and in some societies, bilingualism is necessary for survival. Oxfam (2006) argues that the education system focusing on global citizenship aids young people in creating and further developing their own view of the world and the events around the world, while reflecting on values, norms and ethics by applying what they learn into real life situations and consequently being actively involved in the affairs of their communities at local, national and global levels. They give their opinions by arguing logically and in a civil manner, aiming at influencing positive changes in the world around them. Global citizenship is also beneficial to parents and teachers as it inspires and informs them in showing that students have a voice. Global citizens can contribute positively and aid in building a world that is more equal, and more secure for everyone.

Since global citizenship builds through the exposure to different cultures and languages, it is pertinent to explore both advantages and disadvantages of learning a second language. Researchers in recent years, investigating both advantages and disadvantages of second language learning, have begun to shift their focus from other aspects to personal and social development (Sato, 2018). Learning a second language happens in a social context such as a school or even within family setting, therefore the major influence of a learner's connection to the second language he or she learns is the degree of his or her connectedness to a certain group and in the case of a school setting, his interactions his or her classmates and teachers, at home, his family members, and in other social settings, peers, pen pals and other adults. (Hammond et al., 2019).

On the advantages, bilingualism increases opportunities and choices. Certain advantages of bilingualism at the childhood stage as expressed by Lanza (1997) include the effect it has on the identity of a child, his or her networks of friends and acquaintances, schooling, employment, marriage, preferred area of residence, travel and thinking. For example, speaking multiple languages places children as potential prize employees in the future because businesses thrive on the diversity of ideas, and nowadays, work environments are emphasizing multi-culturalism above degrees and diplomas (Frost & Klaman, 2016). Bilingual and multilingual learners as studies show, tend to be better in social and cognitive skills when compared to monolinguals (Kulkarni, 2013) because the basic skills useful for interpersonal understanding are enhanced in learners of two or more languages, and new conversations and experiences are enabled in the process of learning a second language.

In addition, bilingual children possess a more global mindset and enjoy certain cognitive benefits. Vernon (1976) states that in addition to being open minded, bilingual children enjoy cognitive benefits such as improvement of executive functions, which is necessary for problem solving and other mentally demanding activities. Psychologically, when compared to monolingual children, bilingual learners demonstrate remarkable communication skills (Bransford, 1990). In addition, the global marketplace is constantly expanding (Ignatius, 2017). All of these factors make employees with a second language more valuable. Therefore, bilinguals have more options in employment as a result of their ability to both speak and understand more than one language. Most importantly then, relationships such as in families, marriages, workplaces are better enhanced with the ability to speak two or more languages. In a situation where both parents have different first languages, a child who is bilingual has advantages. He or she can easily communicate in both languages thereby being a bridge in communication. This is very helpful in the family. As a result of the child's ability to speak the languages of both parents, a close and special relationship with each parent is developed (Baker, 2017). Consciously or unconsciously, and at the same time, both parents are passing part of their past and their heritage to the child. In addition, being bilingual enhances a bridge between generations, such as with grandparents and their grandchildren, or with other family members, as this helps to build a sense of belonging to the extended family and provides access to cultures.

Another pertinent advantage of being bilingual is having access to two or more cultures. Second language learning creates two or more different worlds of experience (Valoes, 2020). With the wealth of heritage, namely idioms, sayings, folk stories, history, poetry, literature and music included in a language, both traditional and contemporary, a culture is easily accessed (Arlean & Clayton, 2003), to a wider cultural experience and a greater tolerance of differences in cultures, beliefs and customs achieved by being bilingual. As shown by the previous research, particular advantages in thinking and communication skills are attributable to having two well developed languages (Siegal, Frank, Surian, & Hjelmquist, 2011; Blom, Kuntay, Messer, Verhagen, Leseman, 2014). Bilingualism benefits learners in a variety of ways.

On the other hand, scholars have explored the disadvantages of bilingual education. For example, Folke et al. (2016, p. 5) conducted two experiments to investigate the major difference between cognition in monolinguals and bilinguals. and found out with the calculation of Meta-d', that, in metacognition efficiency, monolinguals exhibited a better cognition than their bilingual counterparts (Maniscalco & Lau, 2014). With a situation that is similar to Thailand, Gaille (2017), a bilingual educator concluded the disadvantages of bilingual education in America, stating that while other district don not offer bilingual education options atall, some district simply stops the offer of bilingual education in high school level, hence creating an inconsistency in the system. Due to this inconsistency, some bilingual learners tend to

forget their second language skills since they are not used on daily bases. Consistency in all the levels of learning is thus, a hallmark of an effective bilingual education.

Learning specific content can be more seriously disadvantageous for younger learners. Lamb (2013) argues that it causes contextual difficulty because various concepts are being taught at the same time. In many schools where bilingual education is offered, one language could possibly be used as a medium of instruction for half of the day, while the second language could be used for the other half, in which case, a student struggling for example with addition and is also struggling with any of the languages of instruction would have his or her formal education negatively affected by these struggles.

A bilingual education is expensive. Stein- Smith (2019) argues that foreign language programs around the world are being cut due to their cost. Such a programme could only be maintained if it is mandatory. A lot of educational settings are removing creative and artistic classes from their curriculum due to the heavy cost, and adding a bilingual programme would just be unthinkable, since also a monolingual programme is cheaper and more comfortable to operate and would still help learners in the acquisition of the needed skills.

Bilingual education can prevent students' involvement in local culture. Gaille (2017) argues that despite the advantages that are received from a bilingual education programme, it may also come with a disadvantage of isolation. Some students studying in a bilingual setting only make friends within that cycle, consequently creating a wider gap in their local culture as a result of two extremely different languages.

Bilingual education can shift a student's focus. Chin (2015) argues that if a bilingual school divides the learning time equally between the two languages, students who are struggling with the second language may use more time for it in order to catch up with the others in the study and use of the second language. As schools enhance other extracurricular training such as vocational training, sports and much more, students who struggle with the second language will show more interest in keeping up with their study

and use of such a second language instead of focusing also on the essential life skills and opportunity provided.

There may be a lack of qualified teachers and assistants. Malarz (1991) opines that an effective bilingual education program requires immersion. This means that both teachers must have a proficient level of both languages that are to be taught and used as a medium of teaching. It requires also that the two teachers apply patience in the continuous effort to lead the students to proficiency in both languages. In contemporary times, most teachers are struggling to meet the minimum requirement in the various subjects, hence adding another language would not be achievable.

It appears that there are more advantages of bilingualism than the disadvantages. However, a learner's connection to a second language could also be shaped either in a formal setting such as schools and language centers or in an informal setting such as interactions with friends from the countries those languages are spoken and travelling. Formal education mostly through but not restricted to international education in recent times have evidently promoted bilingual education because the international education involves a comprehensive approach to education that prepares students intentionally to be active and engaged participants in global contexts (Hurajova, 2015). Many providers of international education are existent. Among them, the Cambridge Program and the International Baccalaureate Program are famous.

The Cambridge Program deals with the cultivation of attitudes in the learners for a positive change in the world. It promises a philosophy of fairness with integrity which radiates everything it does and a commitment to the delivery of goals through the way work is done together, both in teams and as individuals. The Cambridge Global Perspectives (2010) which is a unique and transformational program states its goals the ability to assist students at every stage of school education to develop outstanding skills such as critical thinking, research and collaboration that are transferable and helpful in real life.

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According to Baker (2017), the International Baccalaureate (IB), formerly known as the International Baccalaureate Organization (IBO), is an international educational provider that offers four educational programs: the IB Diploma Programme, and the IB Career-related Programme which is for students aged 15 to 19, the IB Middle Year Programme which is for students aged 11 to 16, and the IB Primary Year Program which is for children aged 3 to 12. The IB programs prepare students for success in a world where facts and fiction merge in the news, and where seeking to understand by asking the proper question is a crucial skill that will allow students to flourish long after they have left the IB programs.

The IB adds more to its curriculum than its educational programmes and certificates. The motivation behind the IB programme is its mission to ensure that education creates a better world. The IB programme values its attribute of striving for excellence and quality through high standard and leadership in pedagogy. This is achieved through collaboration with other partners particularly teachers. As an important part of the twenty first century development, the IB values and inculcates intercultural awareness and mutual respect that cuts across borders of cultures and national identity and that sees every culture as unique. Nezet, Lee, William, & White, (2015) confirm that all of these mentioned are contained in the IB's mission statement which says that it has its objective to develop inquiring and caring mindset to make the world a better by creating intercultural understanding and respect.,

To achieve the IB's (2010) objective, it partners and works through institutions such as schools and international organizations, in creating effective programmes that meet the standards of international education with a rigorous assessment system. With these programs, students all around the globe are encouraged in being proactive and lifelong learners who are compassionate and empathetic with an open mindedness that recognises that other people even with their differences are unique. With all the advantages of bilingualism explored here, the IB posits that attitudes (i.e. appreciation, commitment, confidence, cooperation, creativity, curiosity, empathy, enthusiasm, independence, integrity, respect and tolerance) and skills ( i.e. thinking skills, social etiquette, self-management skills, communication skills, and

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research skills, which are all considered professional) are developed as the learner undergoes the process of second language learning mostly at bilingual education providers to become a global citizen.

An example of a formal bilingual setting where learners go through the process of second language learning in line with the IB (2010) to become a global citizen is a bilingual education provider located in Pathum Thani, Thailand. The school has used the IB curriculum with Thai Ministry of Education (MOE), with a vision of building young people who are knowledgeable, caring and inquiry, and who work hard to establish a better and more peaceful world through intercultural understanding and respect(Nezet et al., (2015). The program comprises early years: toddlers to K 3 level aged 2 -7 years; primary school from grade 1 to grade 6 aged 7 -11; and secondary school from grade 6 to 12 aged 11 to 18.

The teachers at both kindergarten and grade levels make up a balanced ratio of Thai and native English-speaking teachers. Courses are taught in both English and Thai. Students undertake both international and local proficiency exams to ensure proficiency in both languages. The subjects taught in the primary years programme includes: English, Maths, Science, Social studies, Thai language, Mandarin, ICT, Music and Dance. There are other extracurricular activities like all forms of sports, house color events, science days, competitions and exhibitions. Thirdly, while enhancing professional skills and attitudes in learners, it also inspires them to be proficient in both English and Thai languages, as well as creating an atmosphere for the best education possible in this bilingual system of English and Thai languages, and coupled with the goal of instilling in them a sense of moral values, ethics and code of conduct and social responsibility.

The curriculum at the above mentioned bilingual school therefore promotes international mindedness through a philosophy that inculcates attitudes and professional skills. It strives to enhance the development of essential life skills and attitudes in young learners and fulfill their academic purposes. It aims at making available a bilingual programme of education to meet both the local and international standard of demands. It also creates an atmosphere to inculcate in young learners the sense of global citizenship by inspiring them to become caring, honest and considerate global citizens. The bilingual education provider appears to have great faith on the benefits that young learners will receive from these programs in line with the benefits of bilingualism especially on attitude development and sustenance, and the assurance of the education program effectively implementing what it promises.

This present study can be significant as it investigates the acquisition of attitude and professional skills for global citizenship influenced by second language learning at a bilingual education provider that employs IB curriculum, due to three main reasons. First, there are only few studies into this area (Siegel, 2003; Dewaele & Wei, 2013; Morales, Calvo, & Bialystok, 2013), which investigated the acquisition of attitude and professional skills for global citizenship influenced by second language in other social contexts but not in a formal bilingual education setting. Second, these researches studied one aspect of skills and attitudes or another, not attitudes and skills holistically. Third, criticisms of bilingualism raise the question of the extent to which young bilingual learners in a formal bilingual education program can acquire the necessary attitudes and skills for global citizenship. These criticisms state that bilingualism deforms the mind in its building process (Folke et al., 2016), prevents learners from connections to local cultures (Gallie, 2017), shifts their focus (Chin, 2015), affects their attitudes and behavior in a traditional context and is finally it is inconsistent as it does not always continue from the early years to the college stage (Malarz, 1991).

#### **1.2 Research Objectives**

This present study primarily aims at investigating to what degree:

1) bilingual students have acquired attitudes for global citizenship through the learning of a second language at a bilingual education provider in Thailand; and

2) bilingual students have acquired professional skills for global citizenship through the learning of a second language at a bilingual education provider in Thailand.

### **1.3 Hypotheses**

Based on related literature review, the researcher hypothesizes that:

1) second language learning in a bilingual education provider enhances the acquisition of bilingual students' attitudes for global citizenship at a high level; and

2) second language learning in a bilingual education provider enhances the acquisition of bilingual students' professional skills for global citizenship at a high level.

### **1.4 Conceptual Framework**

The present study derives its basis on the grounds, which alludes that contact with a second language impacts a certain change in the individual. Such contacts may take place formally or informally. Formally, an individual undergoes learning at a formal bilingual program, while informally, such learnings occur with interactions on social media, peers and other settings. It was thus argued that second language learning particularly in a formal setting helps build up bilingual learners' positive attitudes and professional skills (Siegel, 2003; Dewaele & Wei, 2013; Morales et al., 2013) because it takes place within a social context where interactions with teachers, other adults, or peers create the connection to a second language. Secondly, learning a second language within six years will enhance bilingual students' second language fluency and essential affective and skill domains (Oliveri, Lawless, Robin, & Bridgeman, 2018), or attitude and professional skills in this study.

As shown in Figure 1, second language learning for six years in a formal bilingual setting is an independent variable in this study while the dependent variables are the extent to which bilingual students acquire attitudes for global citizenship (dependent variable 1) and professional skills for global citizenship (dependent variable2).

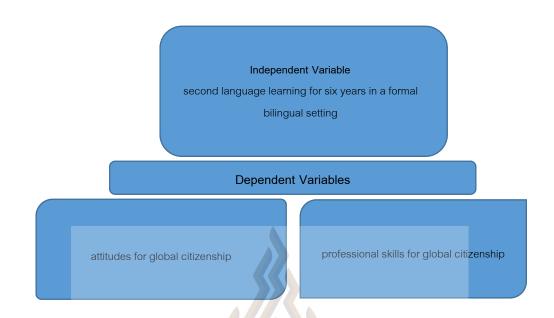


Figure 1.1 Relationship between independent and dependent variable

# **1.5 Definitions of Terms**

1.5.1 Second Language Learning

Second language learning is a process where the learning of another language other than the First Language takes place (Chan, 2014) in a formal bilingual setting.

# <sup>、ベフ</sup>奇とうい着の RO 1.5.2 A Bilingual Education Provider

A bilingual education provider is a programme of learning with the use of two languages as media of instruction for learners in all of the school curriculum (Malarz, 1991). In this study, it is the provider that employs the IB curriculum.

#### 1.5.3 Attitude

Attitude in this study is defined as an acquired tendency to evaluate people, issues, objects and events in a certain way, which may be positive or negative (Gans, 2017; Kendra, 2020).

#### 1.5.3.1 Attitude for Global Citizenship

Attitude for global citizenship is the acquired tendency bilingual students use to evaluate the IB's (2010) philosophy which aims at enhancing them towards global citizenship. The attitude for global citizenship consists of 12 attributes namely:

- 1) appreciation
- 2) commitment
- 3) confidence
- 4) cooperation
- 5) creativity
- 6) curiosity
- 7) empathy
- 8) enthusiasm
- 9) independence
- 10) integrity
- 11) respect
- 12) tolerance (IB, 2010).

According to the IB (2009a, p.24), appreciation refers to appreciating the wonder and beauty of the world and its people. Commitment refers to being committed to one's own learning and persevering and showing self-discipline and responsibility. Confidence in this context means feeling confident in ones' ability as learners, having the courage to take risks and applying what learners have learned and making appropriate decisions and choices. Cooperation deals with cooperating, collaborating, and leading or following as the situation demands, while creativity refers to being creative and imaginative in ones' thinking and in ones' approach to problems and

dilemmas. Curiosity refers to being curious about the nature of learning and about the world, its people and cultures.

Empathy as explained by the IB (2010, p.24), refers to imagining oneself in another's situation in order to understand his or her reasoning and emotions, so as to be open-minded and reflective about the perspectives of others. Enthusiasm refers to enjoying learning and willingly putting the effort into the process. Independence refers to thinking and acting independently, making ones' own judgments based on reasoned argument and being able to defend ones' judgments. Integrity is characterized by being honest and demonstrating a considered sense of fairness. Respect involves respecting oneself, others and the world around. Finally, tolerance deals with being sensitive about differences and diversity in the world and being responsive to the needs of others.

#### 1.5.4 Professional Skills

Professional skills refer to career competencies that are relevant for life (Ingrid & Gutman, 2019).

### 1.5.4.1 Professional skills for Global Citizenship

Professional skills for global citizenship are career competencies necessary for bilingual learners' usage in life with an aim of enhancing them towards global citizenship. These skills include:

- 1) research skills,
- 2) social skills,
- 3) communication skills,
- 4) self-management skills
- 5) thinking skills. (IB, 2010).

The IB (2009, pp.21-23) explains that research skills consist of formulating questions, observations, collecting data, data recording, planning, data organization, interpretation of data and presentation of results. Social skills include respecting others,

cooperating, resolving conflict, group decision making, and adopting a variety of group roles. Communication skills consists of listening to information, speaking clearly and logically, reading, comprehending, concluding from a variety of sources and writing through recording information that are observed, interpreted and analyzed. Communication skills also involve engaging and understanding non-verbal communication. Self-management skills include planning and carrying out activities effectively and time management. Thinking skills consist of acquisition of knowledge. gaining specific facts and ideas, while remembering vocabulary in a similar form, grasping meaning from material learned, communicating and interpreting learning. It also consists of making applications, synthesizing and evaluating.

#### **1.5.5 Bilingual Students**

A bilingual student is defined as one who has a minimal competence in any one of the four skills of language: listening, speaking, reading and writing, in a language apart from his mother tongue (Macnamara, 2010) and who have studied for six year or more in a bilingual program in line with the IB's (2010) essential elements.

### 1.5.6 Global Citizenship

Global citizenship is the idea that a person's identity goes beyond geographical or political boundaries, thus, the need for the development of the knowledge, attitudes, skills and values needed to engage with the world (Oxfam, 2006). The bilingual education provider in this study integrates the five essential elements of the IB into the curriculum to achieve its mission of preparing learners for global citizenship. The elements include, knowledge, attitudes, skills, key concept and action.

### **1.6 Significance of the study**

This study adds knowledge to the growing body of literature on the advantages of second language learning in a formal bilingual setting. It is significant to learners, parents, teachers and bilingual institutions. To Learners, learning a second language in a formal bilingual setting has a lot of advantages as exposed in this study, but most importantly, it comes with the acquisition of attitudes and professional skills for global citizenship.

To Parents, supporting your children in learning a second language in a bilingual education setting is helpful as they not only learn a new language and learn with a new language, they acquire other benefits that come with this process including attitudes and professional skills for global citizenship.

To Teachers of second languages, teaching a second language has strategies that could be effective if properly implemented. The bilingual setting also helps not only in understanding and using such second languages, but also in gaining other benefits accruing from the process which also includes the acquisition of attitudes and professional skills for global citizenship. Hence, a call for proper reflection on the second language learning strategies.



#### **CHAPTER 2**

#### **RELEVANT LITERATURE REVIEW**

This chapter presents a review of relevant literature. It explores the views of other authors and researchers on second language learning, bilingual education for global citizenship, and the essential elements in IB/PYP program.

#### 2.1 Second Language learning

Second language learning as a process involves the learning of a different language other than the first process (Chan, 2014)). This can take place in a formal setting such as a school, or even in an informal setting such as social media. L1 is the language one learns from when one is born (Baker, 2017). Frequently, it is referred to the language(s) of ones' parents or caregivers (Craith, 2012) that is, the person(s) a child spends time with the most from conception till he or she is about 5 years old. From this argument therefore, it is possible for individuals to have more than one L1.

On the other hand, L2 refers to the language that is learned after the acquisition of the L1 (Mandrinan, 2014). It is only if a learning occurs after one has acquired his or her L1, and it can be referred to as your L2. Learning strategies are different from language learning styles because language learning styles are more general. The specific behaviors adopted by students to help them learn are known as language learning strategies (Lavine, 1992). It was argued that learning strategies employed by an individual is impacted by the learning style (Ehrman, 1990). The strategy inventory was developed by Oxford for language learning within this context (Oxford, 1990).

To achieve a greater result, the language learning strategies and the steps that one takes to learn a language, is very relevant in ultimate language performance. Language learning strategy is defined as particular actions, behaviors, steps, or techniques used to enhance learning by the learners themselves (Scarcella, 1992). There are six strategies commonly agreed by most authors which are used by learners in learning a language, namely memory strategy, cognitive strategy, comprehension strategy, metacognitive strategy, affective strategy, social strategy (White, 1993; Madrid, 2000; Oxford, 2003). Among all the classifications of learning strategies, Rebbeca Oxford (2003) a professor of language education and research, who has published more than 160 articles and book chapters on language learners, learning technologies, culture, and teaching methods developed the most used classification in her work entitled "Learning Language Styles and Strategies.

For memory strategy, Oxford (2003, p.13) opines that the ability to memorize is the basic tool adopted by proponents of this strategy, as learners develop mental linkages which are word meaning maps in their brains. These are ways to keep information and make them be retained in the memory in the long term and are also able to retrieve them when need be. To be successful in getting this strategy, learning and retrieval is of important use such as sounds in rhymes, images, example, metal pictures of any word or the meaning of such word, using both images and sounds, movement of the body, with an example of physical response, using mechanicals such as flashcards and locations on the black or white boards or on a page.

For cognitive strategy, Oxford (2003, pp.I2-13) argues that the proponents and individuals adopting the cognitive strategy mostly analyze and reason. They produce internal mental codes which are revised by them to aid in receiving and producing the message in the target language. This strategy enables learners to internalize the language in direct ways. By reasoning, analysing, taking note, making summaries, synthesizing, outlining, practicing in naturalistic settings, and practicing structures and sounds formally, learners can internalize.

For comprehension strategy, Oxford (2003, pp.13-14) argues that the proponents of the comprehensive strategy and learners who adopt the comprehension strategy tend to guess unknown words when listening and reading. Learners use longer

phrases or other words they know in places of words they do not know to avoid gaps in knowledge when speaking and writing. To achieve this, learners make an effort to suggest the meaning of words they do not know by looking into the context used in a sentence or a passage. From reading the entire passage, they try to find clues or nonverbal signs that suggest the meaning of the words in such conversations

For metacognitive strategy, Oxford (2003, p.12) states that the proponents and others who adopt the metacognitive strategy proceed by planning, arranging, focusing, and evaluating on their own process of learning. Learners take ownership of their learning by monitoring their own learning preferences, styles and needs, such as collecting and organizing second language materials, organizing a study space and creating a schedule for L2 revision and learning, watching out for mistakes made in L2, and evaluating task success, and reflecting on the success of any type of learning strategy.

The learning proceeds with the learner observing how the Second Language (SL) teacher speaks in the SL. It involves observing how they themselves speak in the SL, practicing speaking in SL in front of the mirror. The next step involves cross checking with google to find out if their pronunciation is correct, and if not, then correct it.

For Social/Affective strategy, (Oxford, 2003, p.14) argues that in social situations and settings exponents and adoptees of the social/affective strategy control their feelings, motivations and attitudes. This includes asking questions, communicating with others, facilitating conversation and interaction. Johanna (2012) observes that learners who use social and affective strategy motivate themselves to speak in the SL even with the fear of making mistakes. They offer incentives themselves for when they perform better.

They tell themselves that it is alright to make mistakes. They encourage themselves in being confident and in not being afraid to make mistakes. They also make an effort in speaking in the SL to others. If they are confused, they ask for clarifications about the confusing points of the SL when communicating.

Even though each individual makes use of every strategy, some strategies are often used more than others, but all strategies complement and mutually support each other. Carlo (2016, p. 83) argues that if learners are to be tested on all strategies, and a learner notices in his or her average scores that he or she has scores across all strategies, this implies that one uses all the language learning strategies, no matter the frequency. This set of strategies which are interlocked is known as strategy chain. There is no one strategy that is more effective than others.

Teachers often play a vital role to improve their students' learning. Gentry (2013, p. 3) recommends that teachers should consider the fact that learners are different and that every single individual uses different predominant strategies.) This is of great importance to teachers because if teachers understand this, it will help them in planning their lessons for the benefit of each and every student in their learning of languages. Additionally, Darling-Hammond, Flook, Cook-Harvey, Barron & Osher, (2020) recommends that teachers can assist their students as well, in developing learning strategies awareness, as well as enabling them to make use of more strategies. "Stretching" students' learning styles by making them try out strategies outside their primary preference, which could really be beneficial.

For learners on the other hand, Oxford (2003) argues that it is noteworthy that while having some strategies may often be more useful than others, investigations have proved that using a vast array of strategies helps in effective learning. A learner's personality type also has effects on their style of learning and subsequently on their adopted strategies. Optimal learners try possible ways to make their use of strategy to agree with their individual needs and to come up with combinations of strategies that work for them. The strategies of second language learning works at various stages of the learning of a second language. Four different stages of second language acquisition which was originally espoused by linguist Stephen Krashen has been identified by theorists of second language acquisition, including Oliveri., Lawless, Robin, & Bridgeman, (2018) and Haynes (2018), who have been teachers of English as a second language (ESL) with 28 years of experience.

For early production, Oliveri et al. (2018, p.11) note that this stage spans about six months. During this stage, language learners acquire and develop an understanding of up to 1,000 words. Even though they may not be grammatically correct, they still learn to speak some words and begin forming short phrases.

For speech emergence, Oliveri et al. (2018, p.11), states that learners at this stage acquire a vocabulary of up to 3,000 words, and they learn to communicate by putting the words in short phrases, sentences, and questions. At this stage also they may not be grammatically correct. Be that as it may, this stage is an important stage where learners gain greater understanding and start reading and writing in their second language.

For intermediate fluency, Oliveri et al. (2018, p.12) argue that this stage usually spans for a year or more after speech emergence. Learners at this stage possess vocabulary of as many as 6,000 words. Learners often get the communication ability in writing and speech with the use of more complex sentences. At this crucial stage also, learners start to actually think in their second language, and this enhances their gaining of more mastery in speaking it.

For continued language development/advanced fluency stage, Oliveri et al. 2018, p.12), believe that to arrive at this point, it takes most learners between two years to 10 years to reach full proficiency of the second language in all its complexities and nuances. In order to maintain fluency in the second language, second language learners need continuous opportunities to discuss and express themselves in their new language. The keys to learning a new language and being proficient in speaking and writing that

language is consistency and practice. In order to develop their fluency and confidence, students must have a conversation on a regular and daily basis with others in the new language. In addition, it's pertinent for students to keep on working with a classroom teacher on a particular content area which is connected to the new language such as history, social studies or writing. It is also pertinent to note that within six years of study in a bilingual program, the learner can be fluent in a second language, and the language fluency in turn gives him or her advantages.

### 2.1.1 The Advantages of Second Language Learning

### 2.1.1.1 Cognitive Advantages

The unique ability of humans to think is called cognition. Cognition involves comprehension, processing and complex ideas producing. It can be grouped into various subsystems like memory, attention and reasoning. The overall cognitive skills become better when the subsystems are robust. Current researches show that learning a second language is of great benefit in the development of various cognitive skills, and often, bilinguals perform better on cognitive tasks, which includes tasks assessing memory, attention and focus level, and anticipation when compared to monolinguals (Barac, Bialystok, Castro, & Sanchez, 2012). For example, for a learner to gain an insight into new knowledge to handle new situations easily, the cognitive system has to be stronger.

Second language learning has also been shown to create a positive impact on memory. It is pertinent to note that there are three different types of memory namely; working memory, long-term memory and short-term memory (Cowan, 2008). Longterm memory refers to the broad event and general knowledge of experience, capable of being recovered by an individual is termed long term memory. Metalinguistic awareness on the other hand refers to knowledge of the language rules of and the ability to make use of them, while short-term memory refers to storage of a limited amount of temporary information. In the case of accessible memory, the information will be forgotten after a short time. Part of short-term memory is the working memory, which is part of short-term memory that is activated when information has to be recovered and used for a very short time.

Second-language learning in a bilingual context impacts a positive effect on the general cognitive skills development of learners. Speaking more than one language also aids in compensating for cognitive disadvantages resulting from epilepsy, aging, and socioeconomic status that are low. When bilinguals complete problem-solving tasks, they express an advantage. They also demonstrate an advantage when they swiftly change from one task to another (Macwhinney, Fromm, Forbes, & Holland, 2011). Second language learning helps in the development of children's language because it aids the learners in focusing on relevant information (Lantolf, 2000). The learning of a second language is also relevant to the language development of learners, and in turn aids them in easily and rapidly learning other languages. Paap, Myuz, & Sawi, (2014) argue that speaking two or more languages enhances the focus and ability to ignore irrelevant information in second language learners. When handed many cognitive tasks, bilinguals outperform monolinguals. These cognitive tasks included solving problems, multitasking, remembering longer lists of information and tasks switching.

Speaking a second language or more languages helps in compensating cognitive disadvantages which are caused by aging, epilepsy and low socioeconomic status. Bilinguals sometimes outperform monolinguals on memory tasks as such, learning a second-language has a positive impact on memory. Blom, Kuntay, Messer, & Leseman, (2014) opined that the effects of social background may be compensated by bilingualism and this helps to enhance working memory. This came as a result of a study conducted to test working memory tasks where 68 Turkish-Dutch bilingual children and 58 Dutch monolingual children with age running from five to seven were required to carry out tasks which focused on a working memory and needed them to remember and recall numbers or position of dots presented on a screen. The findings demonstrated that based on these tasks, bilinguals performed better than the monolinguals.

Being bilingual enhances an improvement in a learner's working memory. Morales et al., (2013) opines that when compared to monolinguals, bilinguals have better enhancement in working memory capacity, which in turn indicates that they can remember more information and recall them. They carried out a study to test children on a working memory task which required them to take a glance at a couple of pictures and then recall them in the right order. The result revealed that the bilingual children had the ability to remember more pictures compared to the monolingual children. Both the five- year-old children and the seven-year-old children could remember and identify as many pictures as presented.

The improvement of a learners working memory through bilingualism applies also to learners with dysfunctions. Veenstra, Schneider, Bushman, & Koole, (2016) studied the effect of speaking more than one language on the working memory in pediatric epilepsy and concluded that for individuals at the risk of cognitive dysfunction, daily conversations with two or more languages can be helpful in protecting the working capacity of the memory. Bearing in mind that children suffering from epilepsy are at the risk of cognitive dysfunction, and mostly those related to executive functions like attention control or working memory, this study was carried out with 26 bilingual children and 26 monolingual children with age range of 6–17 years. All participants had epilepsy. The results from the standardized working memory tasks revealed that bilingual participants possessed a significantly greater working memory capacity than their monolingual counterparts. Consequently, bilingualism might be a protective variable against working memory dysfunctions related to epilepsy.

Wodniecka (2010) in a study which tested a group of older bilinguals with the age range of 61 to 81 years old, on a discovery of working and test of short-term memory, that on some memory tasks, older bilinguals significantly performed better than monolinguals. Consequently, this suggests that the age for acquiring a second language is not crucial for the enhancement of some cognitive skills. The advantage of speaking a second language on cognitive skills comes from the consistent and daily use of both languages. These advantages include better working and short-term memory.

The results of this study demonstrate that speaking a second language bilingualism can prevent memory capacity degradation, which is often caused by aging in older adults.

Bilinguals exhibit an advantage in completing problem-solving tasks. Abutalebi et al, (2012) stated that speaking two languages enhances people to focus on an assigned task, while disregarding irrelevant information, and this leads to enhanced performance Costa, Hernández, Costa-Faidella & Galles, (2009) in affirmation, opined that bilinguals have faster decision making ability than monolinguals and that speaking two or more languages enhances learners in developing a more robust mental monitoring system. This implies that when an immediate reaction is needed, bilinguals react faster. Hence, the expectation is that bilinguals detect some problems more quickly and solve them faster.

Bilinguals show an advantage with tasks switching (MacWhinney 2010). Despite being able to switch tasks easily, studies have shown that performing many cognitive tasks declines with age. Gold, Kim, Johnson, Kryscio & Smith. (2002) conducted a study to find out the level of problems on task switching between older bilinguals and monolinguals, with tasks switching activities which required a lot of attention and focus. From the study, the bilinguals showed much faster reaction when compared to the monolinguals. Consequently, it was hypothesized that speaking two different languages and switching between them daily gives a cognitive benefit, even at later stages of life.

Learning a second language helps in the language development of children. Metalinguistic awareness needs different cognitive abilities and prior investigations have revealed that bilinguals demonstrate a greater level of this skill. Moreno, Wodniecka, Tays, Alain & Bialystok (2014) investigated the development of a metalinguistic awareness bilingual. The results suggested that learning a second language helps children from childhood to better understand the grammar of their first language. Hermanto (2012) undertook a study which was conducted to find out whether an intensive French-as-a-second-language program shows an improvement on both languages. The findings suggested that learning a second language in a school setting not only encourages the better development of the skills used in first-language that children already have, but also enables them to develop new cognitive skills.

Learning a second language enhances better anticipatory skills. Bonifacci, Giombini, Bellocchi & Contento, (2011) researched into the possibility of bilingualism playing a role in anticipatory skills, by making the individual to predict what is upcoming. From the results, bilinguals could predict elements coming next, and this was helpful in daily conversations. Similarly, Soveri, Rodriguez-Fornells &Laine, (2011) affirmed that some cognitive skills could be better enhanced by long term second language learning experience which enables second language learners to overlook information that are not relevant and focus only on relevant ones when compared to monolinguals.

Conclusively, it can be deduced and affirmed that learning a second language aids the development of various cognitive skills, which is evident in bilinguals often performing better when compared to monolinguals on cognitive tasks, which involves the attention level, focus, memory assessment, and anticipation.

### 2.1.1.2 Academic Advantages

Second language learning helps young learners in enhancing their first language literacy. In mathematics, second-language learners demonstrate certain mathematical advantages such as a maximum self-correction skills and comparable mathematical concept learning (Riordan, 2005). Being instructed in a second language most times creates a positive impact on the learners' performance in important academic areas such as science, mathematics and language arts. Children who undergo second-language learning often express greater ability in spelling and reading comprehension (Paton, 2008).

A review of some recent literature shows that the positive effects of secondlanguage learning goes beyond proficiency in the given language. Learning a second language boasts the ability to read and write in learners, their skills in mathematics and their performance in other subjects that are taught in schools (Brown, 1994). For some obvious reasons, learners of a second-language may possess an advantage when compared to their monolingual peers studying in a learning environment. First, the ability of learners to be aware of the structure of sentences, the recognition of the sound systems and grammar are developed by learning a second language. Second, other areas such as math and science are directly affected by this increased awareness. This is particularly witnessed among learners who exhibit advancement in second-language proficiency.

In mathematics, most second-language learners demonstrate obvious advantages. For example, on learning mathematical concepts, children learning a second language have been shown to perform better especially in focusing on relevant subjects compared to their monolingual peers, and they are often better at not being distracted by irrelevant information (Brown, 1994). The early stages of learning a second language promotes learners' skills in auditory which in turn strengthens learners' understanding in reading, writing and spelling. In a proper learning environment, the benefits are further fostered where parents and teachers express their support for bilingualism and multilingualism. Hipfner-Boucher, Lam, & Chen, (2014) suggested from their research aimed at investigating the impact of bilingual education on a group of learners in Canada, focusing on the development of literacy skills in any of the languages used in the society such as English and a language used for instructions in school, such as French or Chinese. The findings showed that bilingual education does not delay the growth of skills in English literacy, rather, the knowledge of French or Chinese word and sound structure can enhance a better development of English literacy skills in young learners.

Similarly, Cummins (2012) carried out a research to compare the Chinese literacy advantage between monolinguals and bilinguals, and found out that Chinese-speaking children who enrolled in an English-only program where outperformed by Chinese-speaking Canadian-born students who enrolled in a Mandarin-English bilingual program outperformed. Murphy, Macaro, Alba, & Cipolla (2014) noted that some areas of the first language reading skills of a child can be better influenced by

learning a second language. In addition, second-language learning serves as a training for awareness as second-language learners tend to understand better and appreciate more the concept of language as a system with a structure that can be manipulated.

When compared to monolinguals, second-language learners demonstrate some advantages in mathematical skills. They are better in self-correction skills and enhanced mathematical concept learning. Clarkson (2007) believes that the ability to speak two languages sometimes aids the learner of a second-language learners in selfcorrection as they can correct their own mathematical errors. In addition, being proficient in a language can be beneficial in using a second language to learn mathematics. Hemsley, Holm & Dodd, (2014) also concludes that bilingual instruction establishes a better equilibrium for learning mathematics, while Planas (2014) opines that bilingualism through the elaboration and invention of new terms, tend to create more learning opportunities. In important academic areas such as mathematics, science and language arts, receiving instructions in a second language often positively influences second-language learners' performance.

Vega (2014) observed from his studies at an elementary school that students who were enrolled in the immersion program performed better in English, reading, writing and mathematics than students who were enrolled in a monolingual program. While the highest benefit in reading was expressed by native English speakers, native Spanish speakers also showed the highest benefits in mathematics. An appreciable ability in spelling and reading comprehension is often seen in second-language learners. Gebauer, Zaunbauer, & Möller, (2013) suggest that the development of reading skills in both languages is highly influenced by an immersion program.

Hence, it can be concluded that being instructed in a second language most times impacts great performance in core academic areas such as mathematics, science and language arts.

### 2.1.1.3 Personal Advantages

The personal benefits of second-language learning are enormous. These benefits span from an appreciated ability in communication with the use of verbal and nonverbal cues, a consciousness and sensitivity toward the intention of the other speakers, and a high sense of creativity when compared to monolinguals. Moreover, these can be apparent in second-language learners as young as preschool age hence, learners with even the smallest amount of time of exposure to a second language can be seen possessing these lest amount of time of exposure to a second language can be seen possessing these. Kinzler et al., (2015) argues that an environment that houses many languages can enhance the development of skills necessary for taking a perspective and an interpersonal understanding useful in communicating effectively. Siegal (2009) suggests that bilingual skills demand the ability to respond effectively in an enhanced communication. Studies also show that bilingual learners possess a broader view in the way they see their identity and that of others. Learning a second language creates a better appreciation in the establishment of the creation of many identities, an important factor for heritage language learners in making strong ties to their families and cultural heritage.

The capacity of an individual or even a group to handle situations that are familiar and difficult by accepting and enduring the information about such situations is called ambiguity tolerance and this is made possible through the learning of a second language (Dewaele et al., 2013). Second language learners exhibit a greater level of ambiguity tolerance as seen in their show of a massie understanding of and a greater openness to other cultures with their corresponding values, languages beliefs and perspectives which seem to be different from that of the learner. In addition, the study of a second language strengthens the self-identity of the learner as he or she understands himself or herself more and his or her relationship with the external world, the construction of such a relationship with the world and a better understanding of future possibilities (Du, 2015). By providing the grounds for creative ability, uniqueness, flexibility in problem solving and critical thinking, second language learning enables

creative abilities and with this tool, ambiguity tolerance is strengthened through the learning of a second language.

As research shows, learning a second language increases connection to cultural and ethnic identity (Markman &Yow, 2011; Kharkhurin, 2010). It facilitates communication, specifically for language learners with a family connection to the language. Consequently, a deeper development of cultural identities and an appreciation for the transmission of culture through language is promoted by second language learning. With study abroad programs and language exchange programs, second-language learning potentials are enhanced. A great number of benefits which are non-linguistic are seen here ranging from multiple opportunities in educational settings and employment opportunities, greater travelling desire for cultural experience and broadening one's world view, and the willing passion in trying new things.

Markman &Yow (2011) explains that children who are bilingual possess an ability akin to that of an adult in the recognition of the voice tone of a person so as to overcome content reliance. They also possess a maximum sensitivity to the intention of a communication by the speaker. Bilingual children develop a more possible ability to focus on the context of communication while paying more attention to verbal and nonverbal cues because they regularly encounter a more challenging communication exchange. They also make proper use of these cues in understanding the communicative intent of the speakers better.

Learning a second language develops in the learner, a sense of creativity through the development of executive problem solving, flexibility and creative thinking. Kharkhurin (2010) argues that while monolinguals may possess a greater level of linguistic ability as a result of the much acquired vocabulary from their first and only language, two factors may be responsible for the advantages in nonverbal creativity discovered in bilinguals. The first factor stems from the fact that in a situation of multilingual communication, bilinguals have to be open to improvising a unique way out or survival strategy inorder to express the same idea in a different language. The second factor is based on their cultural framework and linguistic experience, and this allows them to see the world widely and from multiple perspectives, with an advantage of enhancing and developing new and creative ways to solve problems.

Lee et al. (2011) indicate that there was a great correlation between creativity and bilingualism despite the age of acquisition, as a result of the exposure to the many cultures, languages and perspectives gotten by the bilingual from the two cultures and languages known to him or her. A study carried out by Leiken (2012) to test the differences between pre-schoolers who were monolingual and others who were bilingual as regards the effect of second language learning on the creativity exhibited in both mathematical and non-mathematical problem solving activities. The result gotten showed that a greater level of creativity in mathematics was found in early bilinguals and other bilinguals. These bilinguals also showed more advantages than their counterparts who were monolingual. From the study, the researcher opined that second language learning has a much greater impact in problem solving and furthers creative thinking development. Knowing two or more languages and by extension, cultures, creates an avenue for people to understand and be more tolerant of the values, beliefs, perspectives and practices of communication in the other person, which is different. (Dewaele et al., 2013).

Learning a second language aids the learner both in acquiring a positive attitude towards learning language differences and possessing the attitude of tolerance of ambiguity. Compernolle (2016) note that that learning a second language demands the learner to possess this ambiguity tolerance in terms of language and the context of socials. so that he or she can acquire an openness to the differences in languages and the other aspects of the ambiguity of tolerance. As Comanaru (2009) suggests, learning a second language increases the chances of being united to one's family and maintains that family ties especially in persons that have a family with a different language other than the one they speak.

Previous studies have shown that a great sense of civic duty and an awareness and appreciation of diversity in languages, cultures and even races in any society is established and developed by service-learning (UNESCO, 2015).

### 2.1.1.4 Societal Advantages

Second-language learning results in societal positive changes through a potentially deep cultural experience. A review of the relevant studies and researches reveals that t second language learning exposes and develops in learners an openness to diversity in cultural experiences, respect of others, cosmopolitanism and a global sense of place (Dagenais, Day, & Toohey, 2006; Crosbie, 2014). Research demonstrates a better social justice and respect of the human rights and dignity of others is better attained through the teaching of a wide variety of languages, which includes endangered languages (Crosbie, 2014). Apart from the advantages earlier mentioned, second-language learning benefits the learner through a rich study of culture enshrined in the school curriculum through humanities such as arts and social studies. (Pishghadam, 2009). This results in a rich insight and knowledge of cultural uniqueness and a development of the students professional, societal and personal lives. Previous studies have shown that a great sense of civic duty and an awareness and appreciation of diversity in languages, cultures and even races in any society is established and developed by service-learning (UNESCO, 2015).

Second language learning inculcates in the learner, a demonstrable understanding of uniqueness in the worlds' diversity. The idea of social justice and empathy towards others are frequently demonstrated by speakers of more than one language (Kabir, 2016). Second-language learners also demonstrate pro-activeness as engaged global citizens. They show a clearer understanding of scientific innovation, global economic and social ideas emerging from other parts of the world. Dagenais, Walsh, Armand, & Maraillet, (2008) carried out a small-scale study to investigate the effectiveness of implementing language awareness activities. The different family language knowledge was shared by students, who compared several vocabularies in the various languages. From the teamwork, discussions emerged among students and their teachers on the relative equality of the various languages and those who spoke them. This benefited students through an increase in knowledge of intercultural relationships and a clearer understanding of diversity of language and global equity. When Forsman (2010) conducted a similar research, he observed that many students had started revitalizing other aspects of their life that were not afore taken seriously and they also noted that some behaviors they exhibit might be strange in the worldview of other people. Consequently, the clearer understanding of individual and cultural differences promoted in students, the sense of respect for diversity and other people. Activities on languages hats were created with student's projects availed the students of the opportunity to develop a better reliability of themselves, understand and appreciate diversity more, and connection to similarities and differences in other cultures. Speakers of more than one language demonstrate enhanced empathy and may be inclined toward social justice. Crosbie, (2014) stated that collaboration and mixing up of various students from very different cultural backgrounds produces an intercultural understanding with an appreciable sense of social justice. From this study, it was realized that learning about cosmopolitan citizenship had emphasis on second language learning in a multicultural classroom and this yielded greater development in intercultural dialogue.

Second-language learners exhibit pro-activeness and engage in global issues. Caldwell (2007) observed that while developing proficiency in their target second language, university students were enhanced in their understanding of global responsibility and civic duty as they studied service learning and language education.

Semaan & Yamazaki (2015) indicated that students' level of global competence increased with their motivation level to learn a second language. For the students, speaking a new language was a stepping stone to other greater aims such as active, positive and meaningful engagement with members of the target communities. Sung (2016) revealed that learners saw themselves as part of a wider global community and not just a local community. Consequently, they had the capacity to relate themselves to people of different cultural backgrounds. This was due to their openness to share ideas and opinions on a number of cultural and global issues such as global warming, human rights and democracy. Participants Were observed to exhibit attitudes depicting open-mindedness and tolerance toward linguistic diversity in the global use of English.

Therefore, it could be concluded that second-language learning avails the learner a potentially intense cultural experience that may bring about positive effects at a societal level. It encourages cosmopolitanism, a global sense of place, the recognition of others, and openness toward diverse cultural experiences.

### 2.1.1.5 Economic Advantages

The skills in learning a second language are seen as a form of human capital in the field of language economics. Lazaruk (2007) opines that speaking a second language comes with some economic benefits such as earning more money, getting more job opportunities, enlarging one's professional or social network and increase in international trade. An example would be a student who learns French as a second language in Canada. The second language learner upon graduation would be able to access a wider range of jobs when compared to a monolingual student because he or she can communicate with a lot of different people, locally and globally.

Skills acquisition in a second language not only benefits the learner but also the future employers as well as cities, companies, businesses and the nation at large. In general, studies (Alba et al., 2009; Agirdag, 2014; Cappellari & Di Paolo, 2015) reveal that speaking a second language directly and indirectly pays more through higher wages and enables much wider access to both the local and global markets as this is of great value to potential employers, **P** 

In addition, studies have shown that communication barriers between nations are broken and the import and export network scope is widened by the literacy and proficiency in a second language. This shows the importance of a second language in foreign and international trade. It also demonstrates that the world being multilingual demands more than the ability to speak a single language for a more prosperous living as seen in higher earnings by second language speakers over monolinguals.

According to Agirdag (2014), the benefit of the ability to speak any particular language is called linguistic capital. Linguistic capital depends on the value of a

language in a social setting. Mostly, minority languages serve as capital in the economy submarket. The earning advantages on bilingual skills could be as a result of the indirect impact of language skills on economy attained through education. Cappellari et al. (2015) states that educational success that in turn produces higher wage returns upon graduation is highly supported by bilingualism. Despite bilingualism creating an opportunity for economic advantages under conditions which include a much stronger advantage in local and global economy, it is pertinent to mention that the value of languages differ economically in both local and global market and that bilingualism may come with an economic penalty (Alba et al., 2009).

Second language skills create a great opportunity for greater mobility in both local and international markets. Harrison, (2013) opines that speaking a second language creates the opportunity both in the job local and global market for a faster mobility coupled with the chances of serving a more diverse clientele, yet it is pertinent to understand that not all languages hold the same economic value. Second-language abilities are highly recognized by future employers and are a very useful tool due to the importance of successful communication in the multilingual nature of today's workplace (Lehtonen, Tuula, Karjalainen & Sinikka, 2008). Since an increase in foreign trade is enhanced by second-language literacy and linguistic diversity, through the enhancement of the possibility of nonverbal communication (reading and writing), and by the removal of the linguistic barriers between countries (Melitz, 2002). From the studies mentioned, it can be deduced that the economic benefits of speaking a second language are enormous and it ranges from higher earnings, greater job opportunities, larger social or professional networks, and increased international trade, to others not mentioned.

In conclusion, second language learning with appropriate strategies of acquisition has shown to offer various advantages such as cognitive advantages, academic advantages, personal advantages, societal advantages and economic advantages. However, these attitudes and professional skills are, first not holistically classified as they are done in the international bilingual programmes, but each research focuses on an aspect of a comprehensive list of attitudes and professional skills.

Secondly, they are not also specific to a formal bilingual social context such as an international bilingual education, but the studies were carried out in an informal bilingual social context such as family, peer groups and monolingual education setting. Since the settings are not specified as formal bilingual institutions which often carry out the bilingual program for global citizenship, which raises the interest in the current research.

# 2.2 Bilingual Education for Global Citizenship

The notion of global education has seen attention lately, despite not being new in discourse (Schattle, 2009). Several institutions make reference to global citizenship in their mission statements. Such institutions have centers for global citizenship and provide programs to realize this mission of making learners global citizens. Oxfam (2006) notes that a global citizen as an individual who is aware of the wider world and has a sense of their own role as a world citizen and that a major characteristic of a global citizen includes the attitudes of respecting and valuing diversity and having an understanding of how the world works. A global citizen aims at actively making the world a more equitable and sustainable place to live in and takes full responsibility to achieve this by being aware of his or her role (Israel, 2012).

Language allows and facilitates a direct level of global citizenship. When coupled with bilingualism, global citizenship deals more with direct experiences with diverse countries, peoples, and cultures (Israel, 2012). Schattle (2017) believes that in the areas of global citizenship there exists an indispensable connection between the global and the local. An awareness of the world is deeply rooted in self-awareness. The attitude of self-awareness enables students to recognize the world within the context of the universality of the human experience. In addition, Reysen & Katzarska-Miller, (2013) argue that cultural empathy must accompany all languages, and this is frequently perceived as a major aim of global education. Cultural empathy helps individuals to analyze questions from a variety of approaches and in navigating skillfully across cultures. It also helps individuals, first in navigating their own multiple cultural identities, and towards experiencing cultures which are unfamiliar to them.

Global citizenship as a benefit of second language learning in a bilingual education provider involves a sense of responsibility which goes with mindfulness. Effective global citizens possess certain attitudes and skills. Reysen & Katzarska-Miller, (2013) argue that effective global citizens are usually flexible, creative and proactive. They are able to solve problems, make practical decisions, think critically, efficiently and effectively communicate ideas and also collaborate within a team. In the 21<sup>st</sup> Century, this set of attributes is recognized as being the foundation for success in absolutely every aspect of life, and especially in the workplace. The acquisition of such attributes and skills is not developed independent from active learning methods and environment (Lagos, 2020). Consequently, a formal bilingual education setting is a proper space for the development of these attitudes and professional skills which enhances global citizenship. The IB therefore ensures these benefits of second language learning in a bilingual education provider through its five essential elements of attitudes, knowledge, key concepts, skills, and action.

### 2.2.1 Essential Elements in IB/PYP Program

International education has been on the rise especially in the second half of the twentieth century when education became connected to countries' development; in international education, a new field of practice looking for improvement in living standards by increasing the quality and availability of education emerged (Shields, 2013). Therefore, international education became understood more as a field rather than a single concept as agreed by Wells (2011). Primarily among the programs that facilitate international education is the IB. Here, learners strive to develop their natural curiosity, acquire the skills necessary to conduct inquiry and research and show independence in learning, and also actively enjoy and love to learn. This love of learning will be sustained throughout their lives. It has been said that the IB aims to facilitate attributes of character, which by their very nature are laden with values (Wells, 2011).

The International Baccalaureate Organization or IB (2012) posits that the IB promotes international education. Issues such as theories of values and attitudes, and

the teaching of values and theories of value acquisition, in IB is noted. Since the world has become more global and complex, the IBO has responded by developing an international curriculum. The IBO has included the concept of attitudes and skills in the list of characteristics acquired by students completing the IB Diploma Program (IBDP) and parts of its elements. For example, The IB Learner Profile (IB 2006), which seeks to categorize the desired values and dispositions of an IB student across the continuum of the three IB programs: PYP, MYP and the IBDP. It is not intended to be a profile of the perfect student; rather, it can be considered as a map of a life-long journey in pursuit of international mindedness (IB, 2010).

The present investigation is concerned with all of the IB Learner Profile (IBLP) attribute statements but focuses particularly on the affective which includes the development of personal qualities and emotional skills and social which includes collaboration with others and the ability to consider and evaluate different perspective aspects of learning (Bullock, 2011). As stated above it is clear that the IBO intends that these attitudes and dispositions will be lifelong. Walker (2002a) opines that the IB program is providing an education for life so the real test will come in twenty years' time. It is therefore to be hoped that when students leave school and enter tertiary education and employment that the values established will not disappear but rather mature and develop in real world situations and will manifest themselves in diverse ways (Hinrichs, 2002).

There are five key components to the IB/PYP curriculum: attitudes, knowledge, key concepts, skills, and action. The first has twelve attitudes the IB (2009b, p. 24) wants students to value and exhibit. They are interwoven throughout every aspect of the curriculum. The attitudinal attributes consist of appreciation, commitment, confidence, cooperation, creativity, curiosity, empathy, enthusiasm, independence, integrity, respect, and tolerance. Each attitudinal attribute is also defined so that it can be measured in accordance with the learner profiles and used to establish content validity of the questionnaire for the present study.

According to the IB (2009b, p.24), appreciation in this context refers to the appreciating the wonder and beauty of the world and its people. Commitment refers to being committed to ones' own learning and persevering and showing self-discipline and responsibility. Confidence in this context means feeling confident in ones' ability as learners, having the courage to take risks and applying what learners have learned and making appropriate decisions and choices. The attitude of cooperation deals with cooperating, collaborating, and leading or following as the situation demands. Another attitude is creativity which refers to being creative and imaginative in ones' thinking and in ones' approach to problems and dilemmas. The IB PYP also list other attitudes such as curiosity which is characterized by being curious about nature of learning, about the world, its people and cultures.

Empathy as explained by the IB (2010, p.24), refers to imagining oneself in another's situation in order to understand his or her reasoning and emotions, so as to be open-minded and reflective about the perspectives of others. Enthusiasm refers to enjoying learning and willingly putting the effort into the process. Independence refers to thinking and acting independently, making ones' own judgments based on reasoned argument and being able to defend ones' judgments. Integrity is characterized by being honest and demonstrating a considered sense of fairness. Respect involves respecting oneself, others and the world around, being honest and demonstrating a considered sense of fairness. Finally, tolerance deals with being sensitive about differences and diversity in the world and being responsive to the needs of others. These are the attitudes which builds up part of the learner and his profile as posited by the philosophy of international education.

The second component is knowledge. According to the IB (2009b, pp.11-16), the second component, knowledge, has six transdisciplinary themes which learners are supposed to investigate throughout the school year. These themes are globally significant and cover concepts that are interconnected, can be addressed in all disciplines (subjects), and can be applied to real life. The transdisciplinary themes are, who we are, where we are, how we express ourselves, how the world works, how we organize ourselves, sharing the planet.

The third component is key concepts. The IB (2009b, p.15-20) posits that there eight concepts that drive instructions through inquiry, questions, and investigation. These concepts include the following: form which addresses what a thing is like; function describing how a thing work; causation which tells why a thing is the way it is; change which talks about how it is changing; connection which refers to how a thing is connected to other things; perspective which talks about the points of views; responsibility emphasizing ones' responsibilities towards a thing; and reflection referring to how learners know a thing.

Following the key concepts is skills, the fourth component. The IB (2009b, pp. 21-23) introduces five transdisciplinary skills which learners are expected to develop as they involve themselves in the learning environment. These skills include thinking skills, social skills, communication skills, self-management skills and research skills. Thinking skills consist of acquisition of knowledge. To acquire proper knowledge, learners are expected to gain specific facts and ideas, while remembering vocabulary in a similar form. They are expected to grasp meaning from material learned, communicate and interpret learning. Learners are expected to make applications by using previously acquired knowledge in practical or new ways and analyze through taking knowledge or ideas apart by separating into component parts, seeing relationships and finding unique characteristics. Learners are also expected to make synthesis by combining parts to create wholes, creating, designing, developing and innovating. Learners make evaluation by making judgments or decisions based on chosen criteria; standards and conditions. In addition, learners think about two or more different points of view at the same time; understanding those points of view and are able to construct an argument for each point of view based on knowledge of the others, realizing that other people can also take one's own point of view. Learners can analyze one's own and others' thought processes; thinking about how one thinks and how one learns.

Learners are expected then to acquire and apply a set of transdisciplinary skills within their learning process. The IB (2009b, pp.21-23) establishes that social skills consist of accepting responsibilities by taking on and completing tasks in an appropriate

manner; being willing to assume a share of the responsibility. It includes respecting others, cooperating, resolving conflict, group decision making, and adopting a variety of group roles. Communication skills consists of listening to directions; listening to others; listening to information, speaking clearly; giving oral reports to small and large groups; expressing ideas clearly and logically; stating opinions, reading a variety of sources for information and pleasure; comprehending what has been read; making inferences and drawing conclusions. Writing, recording information and observations; taking notes and paraphrasing; writing summaries; writing reports; keeping a journal or record. Viewing, Interpreting and analyzing visuals and multimedia; understanding the ways in which images and language interact to convey ideas, values and beliefs; making informed choices about personal viewing experiences. Presenting, constructing visuals and multimedia for a range of purposes and audiences; communicating information and ideas through a variety of visual media; using appropriate technology for effective presentation and representation. Non-verbal communication, Recognizing the meaning of visual and kinesthetic communication; recognizing and creating signs; interpreting and utilizing symbols. 

Self-management skills are very vital in the IB programme. The IB (2009b, p.23) states that self-management skills consist of gross motor skills which refers to exhibiting skills in which groups of large muscles are used and the factor of strength is primary. It also consists of fine motor skills which refers to exhibiting skills in which precision in delicate muscle systems is required. Other concepts include spatial awareness which refers to displaying a sensitivity to the position of objects in relation to oneself or each other, organization which refers to planning and carrying out activities effectively, time management which refers to using time effectively and appropriately and safety refers to engaging in personal behaviour that avoids placing oneself or others in danger or at risk healthy lifestyle, codes of behavior, informed choices.

Research skills are practically essential in the acquisition of the learner profiles for the IB learners. The IB (2009b, p.23) explains that research skills consist of formulating questions, observations, collecting data, data recording, planning, data

organization, interpretation of data and presentation of results. Formulating questions is carried out by identifying a thing of one's wants or needs of knowledge and asking researchable compelling and relevant questions. Observation is done through taking notice of relevant details, using all the senses, while planning is carried out by developing a course of action; outline sketching; figuring out ways of finding out necessary information. Research skills also consist of collecting data through gathering information from a variety of first and second-hand sources such as maps, surveys, direct observation, books, films, people, museums and ICT. Data recording is also part of research skill where the learner is expected to describe and record observations by drawing, note taking, making charts, tallying, writing statements. Data organization is conducted by sorting and categorizing information, arranging into understandable forms such as narrative descriptions, tables, timelines, graphs and diagrams. For their action, students are encouraged to reflect on making informed choices and taking action that will benefit their peers, school staff, and the wider community. These are studentinitiated responses to what they are understanding and learning about themselves and the world in which they live. 

In conclusion, attitudes, knowledge, key concepts, skills, and action which are essential elements of the IB PYP programme (IB, 2010), express how the learning of a second language can cultivate the attitudes and skills needed for global citizenship in the learner. When the learner is able to properly utilize the five elements, the result is the acquisition of the profiles of a learner, namely, inquirers, thinkers, knowledgeable, communicators, principled, open minded, risk taker, caring, balanced and reflective (IB, 2010). His or her knowledge, key concepts and action can be tested by assessments, such as examination. Although the IB curriculum is made up of five essential components, the present study only emphasizes attitudes and skills because these are of more practical use and could easily be seen in real life situations.

### 2.3 Acquiring Attitudes and Professional Skills for Global Citizenship

Attitudes are formed over time as human beings are exposed to stimuli (McLeod, 2020). Therefore, attitudes are learned opinions. While attitudes are enduring, they can change. Bodenhausen & Gawronski, (2013) opine that various approaches to explaining variations have focused on the possibility that there are different types of attitude that vary in their potency and actual stability. For example, political attitudes were held to vary on a continual basis from being highly symbolic to non-symbolic. Symbolic attitudes are based more on effects than well-articulated knowledge and are assumed to be acquired quite early in life, while non-symbolic attitudes, in contrast, deal with thoughtful integration of information which can only be formed at later developmental stages i.e. after a capacity for reasoning develops. Bodenhausen & Gawronski, (2013) explain that whereas the former type of attitude was believed to be more deeply ingrained and impervious to change, later type of attitude was assumed to be more susceptible to modification, via persuasive arguments or changing political realities. Initially, research supported this notion, but it was basically revealed to have a foundation on a methodological artifact.

The claim that symbolic attitudes are intrinsically less susceptible to change was challenged and shown doubtable. Krosnick, (1991) made the distinction between symbolic and non-symbolic and has a great similarity to the distinction between associative and propositional evaluations. Rudman (2004) and Wilson, Lindsey, & Schooler, (2000) have presented an analogous argument which suggests that implicit or associative evaluations should possess developmental priority and should not be so easy to change, when placed side by side with explicit or propositional evaluations. However, Blair (2002) also opined that automatic evaluations are in fact readily malleable.

Stability on the other hand, is one of the properties of strong attitudes. Pablo and Petty (2006) have conceptualized attitudes as differing on a strength continuum. One of the most influential models of attitude content has been the multicomponent model. This perspective opines that attitudes are summary evaluations of an object that have affective, cognitive, and behavioral components. The affective component of attitudes are the feelings or emotions associated with an object. Clore & Schnall, (2005) argues that attitudes are influenced by affective responses in a number of ways. First, after exposure to the attitude object, attitudes are influenced by the emotions that are aroused in a person. For example, a negative attitude toward spiders is produced by the fact spiders make some people feel scared. This negative affective response is likely to cause the production of a negative attitude toward spiders. In addition, attitudes via processes such as classical conditioning and mere exposure is influenced by feelings. Here, the object with other stimuli that elicit particular emotions (classical conditioning) or repeated exposure causes the object to seem more familiar and positive over time paired by the environment.

Cognitions have an impact on many types of attitudes. Haddock, & Maio, (2004) argue that beliefs, thoughts, and attributes which are associated with an object make up the cognitive component of attitudes. For instance, if someone buys a used car, he or she is likely to devote a great attention to its attributes, such as its safety record, gas mileage, and past repair costs. The positive and negative characteristics of the car automatically influences the person's attitude toward the car. Stereotypes are beliefs about the attributes possessed by a particular social group within the study of intergroup attitudes. Many studies have shown that having a prejudicial attitude towards any object or persons leads to possessing negative stereotypes about that object or a group of persons.

Another key concept in attitude formation is behavioral information. Haddock, & Maio, (2004, pp.112 -113) maintain that the mental representation of current, past, and future behaviors regarding an attitude object is referred to as Behavioral information. Scholarly studies and researches have shown that performing a behavior with evaluative implications has an effect on the favorability of attitudes. In a study carried out by Pablo and Petty (2006), as participants listened to an editorial that was played over the headphones, they moved their heads in either an up-and-down motion (nodding the head in agreement) or a side-to-side motion (shaking the head in disagreement). It was discovered and established that participants were more likely to agree with the content of a highly persuasive appeal when they moved their heads upand-down, as measured with side-to-side. Whereas accomplishing a behavior can influence a person's attitude, future behaviors are also influenced by attitudes. How an individual will behave in the future is determined by attitude since attitudes play an important role in anticipating how an individual will behave in a particular situation.

Several factors are responsible for attitude change. Clore & Schnall, (2005) argue that a clearer content of an attitude is important, since attempts to change attitudes are more successful when the persuasive appeal matches the content of the attitude. For instance, a person who dislikes a beverage because it tastes bad, will be more convinced by a strong demonstration of a new, pleasant taste than by positive information about its health value. Haddock, & Maio, (2004) believe that apart from attitude content, another vital issue involves how positive and negative evaluations are structured in memory. Sometimes, it is assumed that possessing positive feelings, beliefs, and behaviors stops the occurrence of negative feelings, beliefs, and behaviors. In other words, this one-dimensional perspective opines that the positive and negative elements of attitudes are kept at opposite ends of a single dimension. It also states that people tend to experience either the end of the dimension or somewhere in between.

There are several oppositions to the one-dimensional view. Haddock, & Maio, (2004) explain that a two-dimensional view opposes this view and it states that positive and negative elements are stored along two separate dimensions. While one dimension investigates whether the attitude has few or many positive elements, the other dimension reflects on whether the attitude has few or much more negative elements. According to this view, people can possess any combination of positivity or negativity in their attitudes. Jonas, Broemer, & Diehl, (2011). (2011) argue that attitudes may occasionally contain both strong positive and negative units, which is characterized as attitudinal ambivalence. This ambivalence is an essential determinant of whether attitudes are strongly held and resistant to change. For instance, research has shown that behaviors are less likely to be predicted by ambivalent attitudes and less likely to predict behavior. Furthermore, when individuals have an ambivalent attitude, they pay more careful attention to a persuasive appeal.

Various institutions play various roles in the development of attitude. Bronfenbrenner (2005) indicates that the social context where any child grows up influences, to a greater extent his or her attitude and development. Basically, these contexts include family, peers, school, social media and even the culture of the country. The institution, which takes a dominant role in the foundation of attitudes, is the family. In virtually every family, the most important role of supporting and stimulating children's academic achievement and attitudes is played by the parent (Epstein, 2009). The parenting style plays a major part. Baumrind, Larzelere, Cowan (2018), a leading psychologist on parenting thinks that parents develop attitudes which would be neither aloof nor be punitive. She insists that parents develop rules for children while supporting and nurturing them. The school plays a major influence in the attitudes of young learners. Social media also has a place in the formation and durability of attitudes in young learners.

Attitudes serve some primary functions. Stahl, Chua, & Pablo, (2012) states that attitudes serve the following functions: object-appraisal, social-adjustment, and externalization. The ability of attitudes to summarize the positive and negative attributes of objects is called Object-appraisal. For example, attitudes can be a major determinant in people's approach to things that are beneficial for them and also in helping people avoid things that are damaging to them. Social-adjustment theory is fulfilled by attitudes that enable people to identify with other persons whom they like and to dissociate from people whom they dislike. For instance, a certain soft drink may be bought by individuals just because it is endorsed by their favorite singer. Attitudes that defend the self against internal conflict is fulfilled by externalization. For example, bad golfers might develop an intense dislike for the game because their poor performance threatens their self-esteem.

Attitude formation has no one dominant theory. Ajzen and Icek (1993) opined that some of the things individuals do are as a result of the benefits they get from them, (functionalist theory) or their previous encounters may have been the basis of our action (learning theory), or it might just be a struggle to restore agreement to two opposing truths that are held (cognitive dissonance theory). The subjective feelings of certainty and uncertainty play an important role in the behaviour of people. Some researches show that an individual's level of certainty about a judgment, decision, thought, attitude, or even self-concept affects how that individual thinks, feels, evaluates, and acts (Abelson, 1988). Attitude formation theories help us to understand how a person's attitude came to exist, takes shape over time and why a person might have a particular attitude (Nowak, 2014). Attitude formation is of particular interest to psychology because attitudes often direct behaviour.

There are three theories that are used most often to describe attitude formation: functionalism, learning theory, and cognitive dissonance theory. All these try to answer the question of where attitudes come from. Allen (1992) argues that value given to someone or something is known as an attitude. Attitude is a favourable or unfavourable evaluative reaction toward something or someone, which is exhibited in one's beliefs, feelings, or intended behaviour (Myers, 2008). It represents a social orientation which is exhibited by an inclination to react to something either in a favourable or an unfavourable way. Attitude is composed of cognitive which are the human thoughts, beliefs, and ideas about something, affective feelings or emotions that something evokes such as fear, sympathy, hate, and cognitive or behavioural which is the tendency or disposition to act in certain ways toward something.

There are several ways through which attitudes are learned. Holmes, Corrigan, Williams, Canar, & Kubiak, (1999) argue that attitudes are born out of what we know (cognitive), feel (emotions), and do (behaviour) about someone or something. They include classical conditioning, instrumental conditioning, observational learning and cognitive dissonance theory. Stussi, Pourtois, Olsson, & Sander, (2020, p.1) present classical conditioning as the process in which an automatic, conditioned response is paired with specific stimuli. A practical instance of this learning theory might be, for example, if a father angrily denounces the most recent increase in income taxes while a mother happily talks about the candidate she worked for winning an election, these may seem as a mere expression of opinions by the parents, but in actual fact, they are also showing nonverbal behaviour which expresses their emotions. If this is often repeated, the child watching the parents will obviously develop a connection between

the topic and the nonverbal behaviour. This nonverbal behaviour will incite an emotional response in the child: the child will feel upset and disturbed when listening to the father and happy when listening to the mother. Hence, when two stimuli are repeatedly made a connection to, the child learns to respond to them with a similar emotional reaction. The stimuli here are the attitude topic and the parental emotion. A formerly neutral stimulus (the attitude topic - taxes or politicians) incites an emotional reaction (the response) that was prior to this solicited only by another stimulus (the parental emotion) through repeated association. Whenever tax increases are mentioned, the child feels an unpleasant emotion; when the elected official is mentioned, the child feels a pleasant emotion.

Observational learning stresses the fact that at childhood stage, learners observe the behaviour of people around them and imitate what they see. An example is a young girl who repeats the opinion of the mother who believes that all elected officials are corrupt. That she still repeats that opinion depends on the responses of her classmates, teacher, and parents. Hence, observations determine the responses we learn, but reinforcement determines the responses we express (Siddman, 1994). The Cognitive dissonance theory stresses that attitudes change and that behaviours can determine attitudes (Cooper, 2001).

Cognition is the individuals' perception of their own attitudes, beliefs, behaviours. The Cognitive dissonance is simply the feelings of tension which arise when one is simultaneously aware of two inconsistent cognitions (Norton, Monin, & Cooper & Hogg, 2003). This can be seen as a situation which involves conflicting attitudes, beliefs or behaviors (McLeod, 2020). From the result of a feeling of mental discomfort leading arises an alteration in one of the attitudes, beliefs or behaviors which eventually reduce the discomfort and restore balance. For example, people are in a state of cognitive dissonance when they smoke (behavior) and they know that smoking causes cancer (cognition). Harmon-Jones and Mills (2019) opine that Festinger (1957) was the first person to investigate the cognitive dissonance theory, from a participant observation study of a cult. The cult had the belief that the earth would be destroyed by a flood. The members who were really committed had given up their homes and

their jobs and went working for the cult, when the flood did not happen, while committed members were more likely to re-interpret the evidence to show that they were right all along that the earth was not destroyed because of the faithfulness of the cult members, fringe members were more inclined to recognize that they had made fools of themselves and to put it down to experience.

Consequently, Harmon-Jones and Mills (2019) argue that according to the cognitive dissonance theory proposed by Festinger, humans have an inner drive to hold all the attitudes and behavior in harmony and to avoid disharmony (or dissonance). This theory is known as the principle of cognitive consistency. The cognitive dissonance theory which has been mostly researched in various situations helps to develop the basic idea in more detail, coupled with the different factors that have been identified which may be relevant to attitude change. Hence the area of focus here comprises three main areas namely, forced compliance behavior, decision-making, and effort. If someone is forced to do something publicly which they do not like to do privately, dissonance is created between their cognition (I did not want to do this) and their behavior (I did it). On the other hand, decision arouses dissonance. Life is filled with decisions. A clear instance is if one was to make a choice or decision on whether to accept a job in a beautiful area of the country or turn down the job so you could be near your friends and family, either choice leads to an experience dissonance. The inevitable consequence is that making a decision removes the possibility that you can enjoy the advantages of the alternative not chosen, but it assures you that you must accept the disadvantages of the alternative chosen.

For professional skills, there are several theories of skill acquisition. Speelman (2005) argues that there are two groups of theories regarding skill acquisition. The first group believes that skill acquisition comes from a process of strategy refinement, and proponents of this idea include Anderson (1982) and Newell (1986). The second group, on the other hand, holds that skills come from improved memory retrieval. This idea can be found in the Instance theories of Logan (1988) and Palmeri (1997).

Of all existing skill acquisition theories, two popular models are accepted by theorists (Anderson, 1982; Vanpatten & Benati, 2010). The first one is adaptive control of thought models (ACT). According to Vanpatten and Benati (2010), ACT developed by John Anderson (1982) is the most well-known model of skill-based theories. He proposed a framework for skill acquisition which included two major stages in the development of a cognitive skill, i.e., declarative and procedural stages. In this framework facts were encoded in a propositional network and procedures were encoded as productions. Vanpatten and Benati (2010) further argue that within this theory, development involves the use of declarative knowledge followed by procedural knowledge with the latter's automatization. Therefore, second language acquisition is conceived to be a progression through three stages, declarative, procedural, and autonomous.

The three stages mentioned above resemble the three stages of cognitive, associative, and autonomous stage, which are posited by Fitts (1964, as cited in Taatgen, 2002) for skill acquisition. Taatgen (2002) in linking Anderson and Fitts stages posits that knowledge needs to be interpreted because it is declarative in the cognitive stage. If the relevant knowledge cannot be retrieved at the right time, interpreting knowledge could be slow and may lead to errors. On the other hand, procedural knowledge is fast and free of errors and can be associated with the autonomous stage because it is compiled. The associate stage is an in-between stage, during which part of the knowledge is declarative and another part compiled.

Ackerman's (1988) model comes the second. His theory states that at consecutive stages of skill acquisition, there are different abilities underlying performance. In the first phase, performance is underlined by the general ability measures such as abstract reasoning. The influence of these factors decreases with the formation of the production systems for the consistent features of performance, and in the second phase, perceptual speed abilities appear as important predictors of performance. Eventually, in the third phase, performance is determined majorly by non-cognitive psychomotor abilities.

In sum, the strategies and theories of learning a second language as well as the theories of acquisition of professional skills, exposed here, correspond and affirm the effectiveness of second language learning (Nurul, 2015). Theories of both attitudes and professional skills also express their connectedness to various stages of human development (Mishra, Templeton, & Meadows, 2017). When the proper strategy of learning is applied at a right age, the resultant effects become the hypotheses in the present study, in that learning a second language brings about the acquisition of attitudes and professional skills on the learners who have studied in a bilingual education program for at least six years.

### **2.4 Related Studies**

Socio-cognitive development has aroused the interest of most researchers down the ages. The positive effects of learning a second language are vast. For example, second language learners are known to be open minded (Peterson, 2013). This is because the contact with a second language exposes them to other cultures. Consequently, their world view changes and their perspectives are broadened, their scope is enlarged. Since the knowledge of two languages can affect how words and thoughts are processed and represented, socio-cognitive development has progressed rapidly. Studies have shown that in terms of understanding the communication necessary for conversations, bilingual children have more advantages (Nicoladis, Hui, & Wiebe, 2018). From research findings, bilingual children have been observed to achieve higher scores than monolinguals children on a number of tests of cognitive ability which includes mental flexibility (Marinova-Todd, 2012), non-verbal problemsolving tasks, understanding the conventional origin of names (Bialystok 1988) distinguishing between semantic similarity and phonetic similarity (Bialystok, 1986) and capacity to judge the grammaticality of sentences (Galambos & Goldin-Meadow, 1990). Therefore, the impacts of learning a second language or more languages cuts across various areas of proper child development and is advantageous to any learner.

Previous studies (e.g Ben-Zeev, 1977; Bialystok, 1986) have shown that the benefits of second language learning ranges from personal, social, cognitive, academic,

cultural to economic benefits. Learning a second or multiple languages has a positive impact on communication skills. These include the use of verbal and nonverbal skills, perspective-taking skills and interpersonal understanding. Fan, Liberman, Keysar, & Kinzler, (2015) carried out a research study which was aimed at investigating the effect of exposure to multiple languages during childhood. Participants were seventy-two children between the ages of four and six. The results revealed that both bilinguals and those who were exposed to a multilingual environment were better able to interpret the speaker's meaning than monolinguals. In addition, children who were just exposed to a second language did as well as bilinguals. As such, these communicative advantages shown by bilinguals take place even with limited exposure to a second language.

Siegal, (2003) also carried out a study that aimed at determining whether bilingualism offered an advantage for children's conversational understanding. The result showed that bilinguals were better able in detecting violations of conversational norms when compared to monolinguals. The researchers then concluded that bilingual skills involved an enhanced ability to appreciate effective communicative responses. From the studies, it could be concluded that a multilingual environment can better enhance the development of perspective-taking skills and interpersonal understanding as these are critical for effective communication.

Since bilingual children must learn to reduce the interferences between their two languages in order to speak only one, they possess an added advantage (Ben-Zeev, 1977; Bialystok, 1986). Another explanation could be that bilingualism shapes learners to focus their attention on the relevant variables in the context, specifically information that are ambiguous or contradictory (Ben-Zeev, 1997). The representational abilities that are involved in effective and efficient communication are built up by increased cognitive abilities. A clear case-study is exemplified as knowing two words that names the same concept could aid learners in developing the understanding that an object or event, which could bolster children's understanding of other people's perspectives, can be represented in more than one way. In adults, through mostly autobiographical memory studies, Javier, Barroso, & Munoz, (1993) investigated how bilinguals use their languages to express emotions has been conducted and has shown that a particular language is an effective retrieval clue if it matches the language in which an event or experience was originally encoded (Marian, & Kaushanskaya, 2000). In terms of emotional significance, memories encoded in the mother tongue are typically richer than memories encoded in the second language (Schrauf, 2006). Bond and Lai (1986) propose that most second languages are typically acquired in a more emotional and neutral setting than the first language. Therefore, in both children and adults, the increased cognitive abilities build up the abilities that deal with effective and efficient communication.

Learning a second language promotes creative ability. This is seen as it promotes unique problem solving, flexibility and creative thinking. Kharkhurin (2010) undertook a study to know whether bilingualism contributes to verbal and nonverbal creative performance. From his research work, he observed and subsequently suggested that even though monolinguals may possess greater linguistic ability as a result of having more vocabulary from their first language, the bilingual possesses the advantage of nonverbal creativity which may be the result of two factors. First, in situations where the same basic idea can be expressed differently in different languages, bilinguals must remain open to creative or unique solutions in multilingual communication situations. Second, their experiences with different cultural and linguistic frameworks allows them to view the world from a wide range of perspectives, which definitely promote novel and creative ways of problem solving. Bilingualism is closely related with creativity. In similar research, Lee and Kim (2011) carried out a study to examine the relationship between individuals' creativity and their degree of bilingualism. The results from the research indicated that bilingualism and creativity are correlated positively regardless of age or gender. It can infer from the research that both the cognitive benefits and the multicultural experiences of speaking two languages can account for bilinguals' greater degree of creativity.

Second-language learning has been shown to strengthen the tolerance of ambiguity and awareness of different perspectives and practices of culture. Dewaele and Wei (2013) undertook a study to investigate the link between multilingualism and the personality trait tolerance of ambiguity. From the findings, it was shown that compared to monolinguals, multilinguals and bilinguals scored significantly higher on tolerance of ambiguity. Forsman (2010) carried out a project with the aim of promoting students' ability to move away from cultural norms and develop respect for difference and diversity. From the results, many students had started to relativize some aspects of their way of life which they had previously taken for granted, as they discovered how their own traditional behaviors may seem strange to others. In general, this conception of cultural differences allows students to more easily accept the behavior of others and respect diversity. Speakers of more than one language exhibited enhanced empathy and may be inclined toward social justice. In sum, knowing many languages and cultures enables people to become more aware and tolerant of differing values, beliefs, perspectives and communicative practices.

Second-language learners are mostly active and engaged global citizens. A study was conducted by Caldwell, (2007) aimed at examining the integration of service learning, an organized activity with the intention of meeting the needs of the local community, into a college-level Spanish conversation course in the United States. Observation at story-time, journals from students about their experience and the postservice questionnaires revealed that language education coupled with service learning enabled the university students with a sense of civic duty and global responsibility, while advancing their proficiency in the target language. Learners of a second-language indirectly learn about the target culture consequently demonstrating more positive attitudes toward another language, its speakers and its culture. They also express sensitivity to other cultures. Ahnagari and Zamanian, (2014) conducted a study which focused on the impact of intercultural learning on the cultural viewpoints and the overall language proficiency of ESL learners in Iran. At the end of the study, the results of a questionnaire showed that the participants in the experimental group when compared to the participants in the control group, had more positive attitudes toward communication and interaction with native speakers and toward development of their overall language proficiency. The results reveal the positive impact of second language learning. For a clearer understanding, the literature focusing on the effects of second language learning will be divided into cognitive impacts, personal impacts and societal impacts.

On the other hand, a study conducted by Brasileiro (2009) observes that in comparison with their monolingual peers, bilingual college students, who were given a time limit, wrote short stories for an English written expression task of similar nonverbal intelligence. The bilinguals scored lower on the writing task than monolinguals, and score on this task was highly correlated with the length of the sample. In other categories that suggest a mastery of writing, bilinguals performed similarly to monolinguals, but wrote fewer function words. When asked to produce an English writing sample in a restricted amount of time, bilinguals were at a disadvantage, and this result may indicate a manifestation of the verbal fluency and lexical access disadvantages for bilinguals in writing at a college level.

In conclusion, related studies have mentioned some advantages and disadvantages of second language learning and the relationship it has in attitude and professional skills acquisition. These studies also explored in a different setting the extent of such advantages which gives room to the present study to explore further on its own hypotheses.

### **CHAPTER 3**

### **RESEARCH METHODOLOGY**

This chapter presents the overview of the research methodology of the study.

# **3.1 Research Design**

This study used explanatory sequential mixed methods for its investigations to allow a complete and synergetic utilization of data and to enhance the validation of findings using quantitative and qualitative data sources (Homer, et al.,2008). Qualitative data were used to explore and confirm quantitative findings (Nutting, et al., 1999), and to augment quantitative outcome (Palinkas, 2014). This method was appropriate for this study because it compared quantitative and qualitative data and it reflected participants' point of view. A triangulation method was used where both qualitative and quantitative approaches were employed.

For the quantitative approach, questionnaires were used because they provided a relatively cheap, quick and efficient way of obtaining large amounts of information from a large sample of people therefore making questionnaires effective in measuring the behavior, attitudes, preferences, opinions and intentions of a large number of subjects (McLeod, 2020). For qualitative approach, semi-structured interviews were used because they examined the studies in-depth to discover how the variables appear to affect the level of agreement (Adams, 2015). Since quantitative data are collected to classify and describe attributes, behaviors and activities of population, (Parahoo, 2006), the primary method of data collection was through a questionnaire. More precisely, the survey took the form of an online questionnaire due to the Covid 19 outbreak.

# **3.2 Population**

### **3.2.1 Target Population**

The target population is made up of seventh to twelfth grade students from a bilingual education provider in Thailand, during the 2020 academic year, with a total number of 270 students (N = 270). Those students were selected because they are from Thailand and have studied continuously in the bilingual school since their early years of formal education. They have been in the bilingual program for more than 6 years and have sat for O-NET Test when they were in grade 3 and grade 6 and thus proficient in bilingualism.

### 3.2.2 Target Sample

This study used a purposive sampling selection with a homogeneous characteristic, i.e. the subjects must have been in a bilingual programme for six years and must have tested for the proficiency levels in both languages. There is no focus on any particular languages; any two languages are sufficient. The size of the population was 270, hence according to Johnson and Christensen (2014), the recommended sample size(n) is between 155 – 159.

# 3.3 Research Instruments ชิลิต Rongsit

Two main instruments, questionnaire, and the semi-structured interview questions were employed to attain balanced data in this study.

### 3.3.1 Questionnaire

The questionnaire was constructed to measure to what extent second language learning helps learners in the acquisition of attitudes and professional skills for global citizenship.

The first part of this questionnaire is the demographics which tells of the participants' gender, age, nationality, grade level, first language, most spoken language, and the length of study in a bilingual programme. The participants can only proceed to the second part if they have studied in a bilingual programme for six years or more. The second part was constructed to measure to what extent second language learning helps learners in the acquisition of attitudes and professional skills for global citizenship. Here all the attitudes and skills mentioned in the definition of terms were explored. There were 71 items in total. Thirty-five items deal with the twelve attitudes while 36 items deal with the five skills mentioned in the definition of terms.

All the items reflect questions on the acquisition of attitudes and professional skills for global citizenship through second language learning in a formal bilingual setting. The questionnaire as seen in Appendix A used a five-point Likert scale ranging from strongly disagree to strongly agree (Brown, 2010).

Table 3.1 Degree of Acquisition of Attitudes and Professional Skill "Likert scale"

	Strongly				Strongly
Degree	Agree	Agree	Neutral	Disagree	Disagree
Scores	25	4	3	2	1

Source: Preedy & Watson, 2010.

# 3.3.2 Interview Questions Rongsit

To supplement the largely quantitative questionnaire, semi-structured interviews were conducted as a means of collecting qualitative data. The semi-structured interviews which include a number of planned questions and which the researcher has more freedom to modify the wordings and question orders were used. There were seventeen open ended questions for the interviews focusing on all the 12 components of attitudes and 5 components of professional skills for global citizenship as explained in the definition of terms in the first chapter.

#### 3.3.3 Validity and Reliability of Instruments

For the validity of the instrument, the developed questionnaires were sent to three experts and the Index-Objective Congruence (IOC) was employed to evaluate questionnaire items based on score range from -1 to +1 (Congruent = +1, Questionable = 0, Incongruent = -1). Then, the questionnaires were corrected and modified following their comments and recommendations. According to Hambleton & Rovinelli, (1977), the items which score less than 0.67 should be revised, whereas items higher or equal to 0.67 scores should be reserved. The IOC scores reached the high value of 0.933.

The total points for each item had the consistency value equal to or above 0.67 to +1 (Turner & Carlson, 2003).

The formula for calculating the IOC=  $\Sigma$ 

Where; IOC=Item Objective Congruence

r= Sum of the scores of individual experts

n= Number of experts

It was also examined by 3 experts for the IOC analysis which ranges from +1 to -1. The total marks of each item from all experts produced out different outcomes. For example, if the total marks were equal to two (2). It is possible that 2 of them select one point (2 x 1), and 1 of them select the zero points (1 x 0). Therefore, the outcome was: 2+0 = 2 points. Moreover, such 2 points had to be divided by total experts which were 3, then the outcome of such an item will be (2/3) = 0.67.

Before the Validity, this questionnaire has 71 statements. After being examined by 3 experts for the IOC analysis, the researcher edited some statements, following the experts' advice to ensure that all the 35 statements were acceptable. The validity score of the questionnaire was 0.95.

Afterward, a pilot study was done before data collection to ensure the reliability of the questionnaires. After IOC approval was obtained, the researcher conducted a pilot-test with a convenience sample of 30 participants from one group at a bilingual education provider in Thailand. The researcher used the Cronbrash's alpha ( $\alpha$ ) formula to test the reliability of the 30 questionnaires (Table 3.3).

Cronbrash's alpha ( $\alpha$ ) formula: $\alpha = \frac{N\bar{c}}{\bar{v}+(N-1)\bar{c}}$ 

Where;

N=the number of items

 $\bar{c}$ =average covariance between item-pairs

v=average variance

The questionnaire items with Cronbrash's alpha 0.70 or greater than 0.70 were used as 0.70 is acceptable according to Cronbrash's alpha rating scale.

Table 3.2	Rating	Scale
-----------	--------	-------

Cronbrash's alpha	Internal consistency
α≥0.9	Excellent
$0.9 > \alpha \ge 0.8$	Good
$0.8 > \alpha \ge 0.7$	Acceptable
$0.7 > \alpha \ge 0.6$	Questionable
0.6 > a ≥ 0.5	Poor
0.5 > a 22	Unacceptable
Source: Biren, & Thomas, 2018	Rangs,

The items on the questionnaire were evaluated with Cronbrash's alpha ( $\alpha$ ) and the result was "0.948". Since the score was greater than 0.70, its reliability level was Excellent.

The primary method for data collection was quantitative research method. Qualitative research method was only used to confirm the data from quantitative findings. Based on Amanda (2003) and Creswell (2013), the instrument for qualitative data collection were those 17 interview questions, which sought explanations on those 71 items in the questionnaire, thus valid and reliable.

# **3.4 Data Collection**

All students from 7<sup>th</sup> to 12<sup>th</sup> grade who had been in a bilingual program for six years were invited to participate in the survey on a voluntary basis, but a total number of 158 students (n=158) completed the online questionnaire. This number represents the population. The following was the procedure for quantitative and qualitative data collection:

1) the researcher requested a consent letter from the University;

2) the researcher then submitted the consent form to the research setting for approval before data collection;

3) after the approval had been granted by the school, the 7<sup>th</sup> to 12<sup>th</sup> graders were informed on the purpose of the survey. For ethical consideration, the consent of participants and their parents were sought and the anonymity of the participants were assured.

4) then the quantitative data collection was first carried out by administering online questionnaire within the month of July 2020, which is the first semester in the academic year 2020;

5) the participants were then asked to complete the online questionnaire individually and to submit it via the online system. The questionnaire survey demanded approximately 15-30 minutes to complete; and

6) after seeing the results from the quantitative findings, the qualitative data collection using a semi-structured interview was completed. In this procedure, each interview session required approximately 10-15 minutes with audio recording and notes taken. Notes were basically taken because some of the participants were not comfortable with recorded audio and the researcher needed to create a conducive atmosphere for open and deep discussions.

# **3.5 Data Analysis**

### 3.5.1 Quantitative Data Analysis

To interpret the quantitative data answering the hypotheses, the data collected through the questionnaire were analyzed with the use of descriptive statistics such as frequency, mean, and standard deviation using a computer program. Quantitative data collected were analyzed statistically by IBM SPSS 21 software and interpreted based on 5-rating scales on page 60. IBM SPSS 21 was chosen because it is compatible with most other software packages and it is user-friendliness for use in data analysis (Field, 2009). Below are the steps used by this study to analyze the data:

The first step was analyzing the demography of respondents and the answers to the items on the second part of the survey. For the first part of the questionnaire, frequency and percentage distribution were used since it displays data that specifies the percentage of observations that exist for each data point or grouping of data points. It particularly expressed the relative frequency of survey responses. The descriptive statistics of mean and standard deviation was used to interpret the data on the second part. Mean scores were interpreted by the range of scores and levels (Table 3.3).

Level of Acquisition	Very high	High	Medium	Low	Very low
Mean score	4.10-5.00	3.10-4.09	2.10-3.09	1.10-2.09	0.00-1.09

Table 3.3 Likert scale range explanation

### 3.5.2 Qualitative Data Analysis

Thematic analysis method was used for analyzing data from the semi structured interviews. This is appropriate in this study because it is a flexible method which could both be used for explorative studies, where there is no clear idea of the patterns being searched for by the researcher, as well as for studies that are more deductive, where the researcher knows exactly what he or she is investigating (Clarke & Braun, 2012). In this case, the researcher knew what he wanted to find out. In this case, the researcher predetermined themes based on the components of attitudes and professional skills for global citizenship.

The data analysis took the following procedures:

1) First was the process of familiarization with data, where the researcher transcribed the audio, read and re-read the notes taken.

2) Second was writing down the themes from the components of attitudes and professional skills for global citizenship.

3) Next, the researcher categorized the data across the different interviews under the various predetermined themes.

4) Then the researcher made a review with the help of an expert.

5) Finally, the researcher produced the report.



### **CHAPTER 4**

### RESULTS

This chapter reports the quantitative findings from the questionnaire and qualitative findings from interview questions.

# **4.1 QUANTITATIVE FINDINGS**

Quantitative findings were collected through the questionnaire which was divided into three parts. The first part was the demographics which tells of the participants' gender, age, nationality, grade level, first language, most spoken language, and the length of study in a bilingual programme. The second part was constructed to measure to what extent second language learning helps learners in the acquisition of attitudes for global citizenship and the third part measured the extent to which second language learning helps learners in the acquisition of professional skills for global citizenship. Here all the attitudes and skills mentioned in the definition of terms were explored. There were 71 items in total. Thirty-five items deal on the twelve attitudes while 36 items deal on the five skills mentioned in the definition of terms.

4.1.1 Personal (Biographic) Data of Participants.

4.1.1.1 Participants' Gender

Based on Table 2.1, 61 of the learners were females (38.6%) and 97 of the bilingual students were males (61.4%). There were more males than females.

Table 4.1 Participants' Gender

Gender	Frequency	Percentage
Male	97	61.4%
Female	61	38.6%
Total	158	100%

4.1.1.2 Respondents' ages

Based on Table 2.2, one hundred and forty-seven participants (93%,) were between 16- 20 years of age. Six participants (3.8) were between 13 -15 years, 3 participants (1.9%) were 20 above while 2 participants (1.3%) were 12 years.

Table 4.2 Respondents' Age

Age Range	Frequency	Percentage
12 Years	2	1.3%
13 -15 Years	6	3.8%
16 -20 Years	147	93%
Above 20 Years	3. UN	1.9%
Total	Ran 158	100%

#### 4.1.1.3 Nationality

Based on Table 2.3, one hundred and thirty-nine participants (88%) were from Thailand, while 19 (12%) were from China.

Table 4.3 Nationality

Country	Frequency	Percentage
Thailand	139	88%
China	19	12%
Total	158	100%

#### 4.1.1.4 Grade Level

Based on Table 2.4, seventy-five participants (47.5%,) were in grade level 11, while 38 participants (24.1%) were in grade level 10, and 21 participants were in grade level 9. While 20 participants (12.7%) were in grade level 12, 2 participants (1.3%) were in grade level 8 and 2 participants (1.3%) were in level 7.

Grade Level	Frequency	Percentage
7	2	1.3%
8	2	1.3%
9	21	13.3%
10 5	38	24.1%
11 22	75	47.5%
12	201 Pan 201	12.7%
Total	158	100%

Table 4.4 Grade Level

#### 4.1.1.5 First Language

Based on Table 2.5, one hundred and thirty-six participants (86.1%) had Thai language as their first language, 20 participants (12.7%) had Chinese as their first language and 2 participants (1.3%) had English as their first language.

Table 4.5 First Language

First Language	Frequency	Percentage
Thai	136	86.1%
Chinese	20	12.7%
English	2	1.3%
Total	158	100%

4.1.1.6 Most spoken language:

Based on Table 2.6, the most spoken language for 131 participants (82 %) was Thai language. Sixteen participants (11%) spoke Chinese and 13 participants (8.2%) had English language as their most spoken language.

Table 4.6 Most Spoken Language

Most Spoken Language	Frequency	Percentage
Thai	131	82.9%
Chinese	13	8.2%
English	18	11.4%
Total	158	100%

4.1.1.7 Years in a Bilingual Programme

Based on Table 2.7, thirty-seven (23.4%) participants had spent 9 years in a bilingual program. Thirty-four (19.6%) participants had spent 11 years in a bilingual program. Thirty-one (19.6%) participants had spent 9 years in a bilingual program. Twenty (12.7%) participants had spent 8 years in a bilingual program. Nineteen (12%) participants had spent 9 years in a bilingual program. Twelve (7.6%) participants had spent 9 years in a bilingual program. Twelve (7.6%) participants had spent 9 years in a bilingual program. Five (3.2%) participants had spent 9 years in a bilingual program.

Number of Years in a Bilingual	Frequency	Percentage
Programme		
6	5	3.2%
7	12	7.6%
8	20	12.7%
9	37	23.4%
10	31	19.6%
11	34	21.5%
12	19	12%
Total	158	100%

Table 4.7 Years in a Bilingual Programme

#### 4.1.1.8 Summary of personal data

Among the 158 participants, 97(61.4%) were male while 61(38.6%) were female. One hundred and forty-seven students (93%) were between the ages of 16 and 20. One hundred and forty participants were Thais (88%) while 20(12%) were Chinese. Seventy-five participants (47.5%) were in the  $11^{\text{th}}$  grade, while 38(24.1%) were in 10th grade, 21 (13.3%) were in 9<sup>th</sup> grade, 20 (12.7%) were in  $12^{\text{th}}$  grade, 2(1.3%) were in 8<sup>th</sup> grade and 2(1.3%) in 7<sup>th</sup> grade. One hundred and thirty-seven participants (86.1%) had Thai as their first language, with 20(12.7%) having Chinese as their first language and 2(1.3%) having English as their first language.

The number of years of studying in a bilingual program ranged from 6 years to 12 years. Thirty-seven participants (23.4%) had spent 9 years in a bilingual programme, 34 students (21.5%) spent 11 years in the bilingual programme and 31 students (19.6%) had been in the programme for 10 years. Twenty participants (12.7%) had been studying in the bilingual program for 8 years. Nineteen students (12%) for 12 years, 12 students (7.6%) for 7 years and 5(3.2%) students for 6 years.

# 4.1.2 Findings from Participants' Acquisition of Attitude towards Global Citizenship.

Items	(x)	SD	Level
1. Second language learning in a			
bilingual setting has made me appreciate			
1.1 the wonder and beauty of the world	4.59	.7404	Very High
1.2 people from culturally diverse backgrounds	4.59	.7404	Very High
2. Second language learning in a			
bilingual setting has made me committed			
to			
2.1 learning	4.66	.7277	Very High
2.2 persevering	4.61	.8649	Very High
2.3 showing self-discipline	sit 4.61	.8454	Very High
2.4 responsibility	4.57	.8623	Very High
3. Second language learning in a			
bilingual setting has made me courageous			
to			
3.1 take risks	4.40	.8123	Very High
3.2 apply what I have learned in making appropriate decisions and choices	4.50	.9129	Very High

Table 4.8 Participants' Acquisition of Attitude towards Global Citizenship

Items	(x)	SD	Level
4. Second language learning in a			
bilingual setting has made me			
	4.61	.8562	Very High
4.1 cooperate with others			
	4.56	.8967	Very High
4.2 collaborate with others			
4.3 lead in a given circumstance	4.55	.8449	Very High
	4.60	.8115	Very High
4.4 follow as the situation demands			
5. Second language learning in a			
bilingual setting has made me creative and			
imaginative in			
5.1 my thinking	4,63	.7909	Very High
328	i No		
5.2 my approach to problems and	4.65	.7203	Very High
dilemmas	5/0		
6. Second language learning in a			
bilingual setting has made me curious about			
6.1 the nature of learning	4.61	.8008	Very High
6.2 the world	4.62	.7339	Very High
6.3 people of the world	4.66	.6888	Very High

Table 4.8 Participants' Acquisition of Attitude towards Global Citizenship(cont.)

	1	0	
Items	(x)	SD	Level
6.4 cultures of the world	4.64	.7229	Very High
7. Second language learning in a			
bilingual setting has made me imaginatively			
project myself into another's situation,			
becoming open minded and reflective about			
their perspective, in order to understand			
their			
7.1 thoughts	4.63	.7153	Very High
7.2 reasoning	4.63	.7153	Very High
7.3 emotions	4.67	.6300	Very High
8. Second language learning in a bilingual setting has made me	it in the set		
8.1 enjoy learning	4.62	.7165	Very High
8.2 willing to put effort in my learning process	4.66	.6828	Very High
9. Second language learning in a			
bilingual setting has made me			
9.1 think independently	4.64	.7229	Very High
9.2 act independently	4.66	.6888	Very High
		I	I

### Table 4.8 Participants' Acquisition of Attitude towards Global Citizenship(cont.)

Items	(x)	SD	Level
9.3 make my own judgements based on	4.71	.6095	Very High
reasoned principles			
9.4 able to defend my judgements	4.67	.6873	Very High
10. Second language learning in a			
bilingual setting has made me develop a firm			
sense of			
10.1 integrity	4.67	.7052	Very High
10.2 fairness	4.67	.6494	Very High
10.3 honesty	4.73	.5920	Very High
11. Second language learning in a			
bilingual setting has made me respect	Sit		
11.1 myself	4.62	.6092	Very High
สียรังสิต Rang	2	(544	V II. 1
11.2 others	4.67	.6544	Very High
11.3 the world around me	4.55	.6534	Very High
12. Second language learning in a			
bilingual setting has made me feel			
12.1 sensitive towards differences and	4.57	.6732	Very High
diversity in the world			
12.2 responsive to the needs of others	4.52	.6454	Very High

Table 4.8 Participants' Acquisition of Attitude towards Global Citizenship(cont.)

From Table 4.8, all items show the mean scores at a very high level of the acquisition of attitudes for global citizenship. Item 1.1 is the first component of attitude for global citizenship, appreciation, which explores the wonder and beauty of the world. Item 1.2 is the first component of attitude for global citizenship, appreciation, which explores people from culturally different backgrounds. Item 2.1 is the second component of attitude for global citizenship, commitment, which explores commitment to learning. Item 2.2 is the second component of attitude for global citizenship, commitment, which explores persevering. Item 2.3 is the second component of attitude for global citizenship, commitment, which explores presevering. Item 2.4 is the second component of attitude for global citizenship, commitment, which explores responsibility.

Item 3.1 is the third component of attitude for global citizenship, courage, which explores taking risks. Item 3.2 is the third component of attitude for global citizenship, courage, which explores applying what I have learned in making appropriate decisions and choices. Item 4.1 is the fourth component of attitude for global citizenship, cooperation, which explores cooperating with others. Item 4.2 is the fourth component of attitude for global citizenship, cooperation, which explores collaborating with others. Item 4.3 is the fourth component of attitude for global citizenship, cooperation, which explores the leading in a given circumstance. Item 4.4 is the fourth component of attitude for global citizenship, cooperation, which explores the leading in a given circumstance. Item 4.4 is the fourth component of attitude for global citizenship, cooperation, which explores following as the situation demands.

Item 5.1 is the fifth component of attitude for global citizenship, creativity, which explores the creativity in thinking. Item 5.2 is the fifth component of attitude for global citizenship, creativity, which creativity in approach to problems and dilemmas. Item 6.1 is the sixth component of attitude for global citizenship, curiosity, which explores the nature of learning. Item 6.2 is the sixth component of attitude for global citizenship, curiosity, which explores the vorld. Item 6.3 is the sixth component of attitude for global citizenship, curiosity, which explores the people of the world. Item 6.4 is the sixth component of attitude for global citizenship, curiosity, which explores the culture of the world.

Item 7.1 is the seventh component of attitude for global citizenship, empathy, which explores the thoughts of others. Item 7.2 is the seventh component of attitude for global citizenship, empathy, which explores the reasoning of others. Item 7.3 is the seventh component of attitude for global citizenship, empathy, which explores the emotions of others. Item 8.1 is the eighth component of attitude for global citizenship, enthusiasm, which explores enjoying learning. Item 8.2 is the eighth component of attitude for global citizenship, enthusiasm, which explores the willingness to put more effort in the learning process. Item 8.3 is the ninth component of attitude for global citizenship, independence, which explores independent thinking.

Item 9.1 is the ninth component of attitude for global citizenship, independence, which explores independent acting. Item 9.2 is the ninth component of attitude for global citizenship, independence, which explores making my judgement based on reasoned principles. Item 9.3 is the ninth component of attitude for global citizenship, independence, which ability to defend my judgement. Item 10.1 is the tenth component of attitude for global citizenship, integrity, which explores integrity. Item 10.2 is the tenth component of attitude for global citizenship, integrity, which explores honesty. Item 10.3 is the tenth component of attitude for global citizenship, integrity, which explores honesty. Item 10.3 is the tenth component of attitude for global citizenship, integrity, which explores honesty. Item 10.3 is the tenth component of attitude for global citizenship, integrity, which explores honesty. Item 10.3 is the tenth component of attitude for global citizenship, integrity, which explores honesty. Item 10.3 is the tenth component of attitude for global citizenship, integrity, which explores honesty. Item 10.3 is the tenth component of attitude for global citizenship, integrity, which explores honesty. Item 10.3 is the tenth component of attitude for global citizenship, integrity, which explores honesty.

Item 11.1 is the eleventh component of attitude for global citizenship, respect, which explores respecting oneself. Item 11.2 is the eleventh component of attitude for global citizenship, respect, which explores respecting others. Item 11.3 is the eleventh component of attitude for global citizenship, appreciation, which explores respecting the world. Item 12.1 is the twelfth component of attitude for global citizenship, tolerance, which explores sensitivity towards differences and diversity in the world. Item 12.2 is the twelfth component of attitude for global citizenship, tolerance, which explores sensitivity towards differences and diversity in the world. Item 12.2 is the twelfth component of attitude for global citizenship, tolerance, which explores to the needs of others.

# 4.1.3 Findings from Participants' Acquisition of Professional Skills towards Global Citizenship.

Items	(X)	SD	Level
1. Second language learning in a			
bilingual setting has helped me in			
	4.69	.6458	Very High
1.1 formulating questions			
	4.74	.5733	Very High
1.2 observations			
	4.74	.5869	Very High
1.3 collecting data			
	4.73	.5787	Very High
1.4 recording data			
	4.73	.5564	Very High
1.5 planning			
	4.62	.5883	Very High
1.6 data organization		No.	
240	4.71	.5300	Very High
1.7 interpretation of data	andsit		
	4.76	.6439	Very High
1.8 presentation of results			
2. Second language learning in a			
bilingual setting has helped me in			
	4.69	.5944	Very High
2.1 respecting others			
	4.72	.5449	Very High
2.2 cooperating			

Table 4.9 Participants' Acquisition of Professional Skills towards Global Citizenship.

Items	(x)	SD	Level
2.3 resolving conflict	4.76	.5419	Very High
2.4 group decision making	4.76	.6458	Very High
2.5 adopting a variety of group roles	4.68	.5821	Very High
<b>3. Second language learning in a bilingual setting has helped me in</b>	RA		
3.1 listening to information	4.78	.5054	Very High
3.2 speaking clearly and logically	4.79	.5287	Very High
3.3 reading from a variety of sources for information and pleasure	4.76	.5760	Very High
3.4 comprehending from a variety of sources for information and pleasure	4.81sit	.5706	Very High
3.5 concluding from a variety of sources for information and pleasure	4.75	.5077	Very High
3.6 writing and recording information	4.78	.5706	Very High
3.7 observing visuals and multimedia	4.75	.5975	Very High

## Table 4.9 Participants' Acquisition of Professional Skills towards Global Citizenship (cont.)

## Table 4.9 Participants' Acquisition of Professional Skills towards Global Citizenship (cont.)

Items	(x)	SD	Level
3.8 viewing visuals and multimedia	4.73	.5760	Very High
3.9 interpreting visuals and	4.74	.6310	Very High
multimedia			
3.10 analyzing visuals and	4.73	.5944	Very High
multimedia			
3.11 engaging and understanding	4.72	.5657	Very High
non-verbal communication			
4. Second language learning in a bilingual	817		
setting has helped me in			
4.1 planning activities	4.73	.6399	Very High
4.2 carrying out activities	4.71	.6687	Very High
effectively			
4.3 time management	4.67	5536	Very High
5. Second language learning in a bilingual	S.	5	
setting has helped me in	, un		
5.1 knowledge acquisition	4.74	.5508	Very High
5.2 gaining specific facts and ideas	4.74	.5987	Very High
5.3 grasping meaning from		.5914	Very High
materials learned	4.71		
5.4 communicating	4.79	.5455	Very High
5.5 interpreting learning	4.72	.5843	Very High

Items	(x)	SD	Level
5.6 making applications	4.71	.5439	Very High
5.7 synthesizing	4.71	.5319	Very High
5.8 evaluating	4.74	.5431	Very High
5.9 remembering vocabulary from	4.77	.5352	Very High
ideas learned			

Table 4.9 Participants' Acquisition of Professional Skills towards Global Citizenship (cont.)

From Table 4.9, all items show the mean scores at a very high level of acquisition of professional skills for global citizenship. Item 1.1 is the first component of professional skills for global citizenship, research skills, which explores formulating questions. Item 1.2 is the first component of professional skills for global citizenship, research skills, which explores observation. Item 1.3 is the first component of professional skills for global citizenship, research skills, which explores collecting data. Item 1.4 is the first component of professional skills for global citizenship, research skills, which explores recording data. Item 1.5 is the first component of professional skills for global citizenship, research skills, which explores planning. Item 1.6 is the first component of professional skills for global skills for global citizenship, research skills, which explores planning. Item 1.6 is the first component of professional skills for global skills for global skills for global citizenship, research skills, which explores planning. Item 1.6 is the first component of professional skills for global citizenship, research skills, which explores the first component of professional skills for global citizenship, research skills, which explores for global skills fo

Item 2.1 is the second component of professional skills for global citizenship, social skills, which explores respecting others. Item 2.2 is the second component of professional skills for global citizenship, social skills, which explores cooperating. Item 2.3 is the second component of professional skills for global citizenship, social skills, which explores resolving conflicts. Item 2.4 is the second component of professional skills for global citizenship, research skills, which explores group decision making. Item

2.5 is the second component of professional skills for global citizenship, research skills, which explores adopting a variety of group roles.

Item 3.1 is the third component of professional skills for global citizenship, communication skills, which explores listening to information. Item 3.2 is the third component of professional skills for global citizenship, communication skills, which explores speaking clearly and logically. Item 3.3 is the third component of professional skills for global citizenship, communication skills, which explores reading from a variety of sources for information and pleasure. Item 3.4 is the third component of professional skills for global citizenship, communication skills, which explores comprehension from a variety of sources for information and pleasure. Item 3.5 is the third component of professional skills for global citizenship, communication and pleasure. Item 3.5 is the third component of professional skills for global citizenship, communication skills, which explores concluding from a variety of sources for information and pleasure. Item 3.6 is the third component of professional skills for global citizenship, research skills, which explores writing and recording information.

Item 3.7 is the third component of professional skills for global citizenship, communication skills, which explores observing visuals and multimedia. Item 3.8 is the third component of professional skills for global citizenship, communication skills, which explores viewing visuals and multimedia. Item 3.9 is the third component of professional skills for global citizenship, communication skills, which explores interpreting, visuals and multimedia. Item 3.10 is the third component of professional skills for global citizenship, communication skills, which explores analyzing visuals and multimedia. Item 3.10 is the third component of professional skills for global citizenship, communication skills, which explores analyzing visuals and multimedia. Item 3.11 is the third component of professional skills for global citizenship, communication skills, which explores analyzing visuals and multimedia. Item 3.11 is the third component of professional skills for global citizenship, communication skills, which explores analyzing visuals and multimedia. Item 3.11 is the third component of professional skills for global citizenship, communication skills, which explores analyzing visuals and multimedia. Item 3.11 is the third component of professional skills for global citizenship, communication skills, which explores engaging and understanding non-verbal communication.

Item 4.1 is the fourth component of professional skills for global citizenship, self- management skills, which explores planning activities. Item 4.2 is the fourth component of professional skills for global citizenship, self -management skills, which explores carrying out activities effectively. Item 4.3 is the fourth component of professional skills for global citizenship, self- management skills, which explores time

management. Item 5.1 is the fifth component of professional skills for global citizenship, thinking skills, which explores knowledge acquisition. Item 5.2 is the fifth component of professional skills for global citizenship, thinking skills, which explores gaining specific facts and ideas. Item 5.3 is the fifth component of professional skills for global citizenship, thinking skills, which explores grasping meaning from materials learnt.

Item 5.4 is the fifth component of professional skills for global citizenship, thinking skills, which explores communicating. Item 5.5 is the fifth component of professional skills for global citizenship, thinking skills, which explores interpreting learning. Item 5.6 is the fifth component of professional skills for global citizenship, thinking skills, which explores making applications. Item 5.7 is the fifth component of professional skills for global citizenship, thinking skills, which explores making applications. Item 5.7 is the fifth component of professional skills for global citizenship, thinking skills, which explores formulating questions synthesizing. Item 5.8 is the fifth component of professional skills for global citizenship, thinking skills, which explores remembering of professional skills for global citizenship, thinking skills, which explores remembering vocabulary from ideas learnt.

#### 4.2 Qualitative Findings

Ten students voluntarily participated in the interviews and they answered the 17 questions. The data were then analyzed and categorized into themes and subthemes which reflect attitudes and skills for global citizenship as shown in 4.2.1 and 4.2.2.

#### 4.2.1 Themes and Subthemes Reflecting Attitudes for Global Citizenship

The themes and subthemes reflecting attitudes for global citizenship are as follows: appreciation (appreciation of the world and its people), commitment (commitment to learning, persevering, self-discipline and responsibility), confidence (confidence in action and risk taking), creativity (creativity in thinking), curiosity (curiosity about learning, other languages and the world's people), cooperation (cooperating with others) empathy (empathy towards others), enthusiasm (enthusiasm towards learning and using a second language), independence (independence in communication, thinking and acting), integrity (honesty, fairness, principle and balance), respect(respect of oneself and others), and tolerance(tolerance towards other people and the diversity in the world).

Table 4.10 Themes and Subthemes Reflecting Acquisition of Attitudes towards Global Citizenship

Themes	Participants' Opinion(Subthemes)	
Appreciation	Appreciation of the world and its people	
	• Learning a second language in a bilingual	
	setting connects me to not only a language but a	
	culture that initiates and sustains curiosity to	
	discover more about the world and the more I	
	explore, the more I appreciate the world.	
	• Honestly speaking, being a bilingual has	
	opened up ways to make new friends and	
	appreciate other people.	
	• Meeting foreign teachers who teach us a	
	new language, and studying with both English	
Le la	and Thai has helped me appreciate people of the	
75%	world. I understand that everyone is unique	
Commitment	a sit	
Commitment	Commitment to learning, persevering, self-	
	discipline and responsibility	
	• Learning fiesta new language and	
	studying with two different languages has made	
	me to be more serious since it is more challenging	
	and requires much effort to be better in my own	
	learning.	

Themes	Participants' Opinion(Subthemes)
	• It is not easy to learn a second
	language, study with two languages,
	especially with a second language. It
	needs persevering and constant practice,
	so this has also helped me to learn how to
	persevere in real life situations too.
	• Studying all courses in two
	languages requires great self-discipline. It
	requires first understanding the languages
	especially that is not your first language
	but just a studied language. It requires
	self-discipline
	• Being responsible is really
	necessary to be successful in learning and
	studying with two languages. Doing your
L'e	homework and other duties and taking
733 mer	other responsibilities seriously too.
Confidence	Confidence in actions and risk taking
~ ° V G Ø	• Applying all the strategies of
	second language learning and studying in
	both English and Thai for 8 years has
	developed that confidence feeling in what
	I can do as a learner.

Table 4.10 Themes and Subthemes Reflecting Acquisition of Attitudes towards Global Citizenship (cont.)

Themes	Participants' Opinion(Subthemes)
	• Learning a new language and
	studying all courses in a language you
	have learnt is itself a risk because you
	have to take examinations in that
	language you have learnt. We also study
	about having the courage to take risks as
	one of the profiles learners should have.
Creativity	Creativity in thinking
	• My level of creativity has
	increased since I joined a bilingual school
	7 years ago because I can use my
	imaginations to come up with works in
	both languages and in my approach to
	problems and dilemmas.
Curiosity	Curiosity about learning, other
32	languages and the world's people
221810 21	• The more I use vocabulary from
~ )ลัยวังสิต	learning a second language, the more
0.0101	curious I am to find out where these
	words came from, for example, I have
	found out that some English words are of
	Latin and French origin.
	• I am curious about the nature of
	my learning from my ability to learn and
	study with two languages.

Table 4.10 Themes and Subthemes Reflecting Acquisition of Attitudes towards Global Citizenship (cont.)

Themes	Participants' Opinion(Subthemes)
	The bilingual program I go through has
	brought me in contact with other people and
	cultures. Interaction and learning creates a
	great curiosity in me to explore more on what
	we have in common and what our differences
	are
Cooperating	Cooperating with others
	• Since I learnt the IB curriculum and
	now Cambridge and since I started learning a
	second language, I have seen myself being
	able to work together and participate more in
	team work.
	• From learning a new language, I
	contribute to class discussions and work with
	others in my team to achieve the team's goals
13	with the help of a bilingual environment that
Jen a	inspires me.
Empathy กลัยรังสิ	Empathy towards others • I have come to learn more about the
	world and its people. I have realized that we
	are all the same and that has made me feel
	more empathetic and placing myself in
	another person's situation.

Table 4.10 Themes and Subthemes Reflecting Acquisition of Attitudes towards Global Citizenship (cont.)

Themes	Participants' Opinion(Subthemes)
	Whatever happens to another, may have
	been me.
	• I understand from contacts with the
	friends from other countries that people think
	differently. Language also reveals emotions
	and studying the language and culture of
	others have made me feel and understand what
	they feel and the way they do
Enthusiasm	Enthusiasm towards learning and using a
	second language
	Second language learning in a bilingual
	program has developed in me that intense
	eagerness and interest because the more I use
20	my second language to communicate with
5	people, the more I make new friends both
2º20	online and on a face to face basis, the more
2-23 SMEING	interesting it is for me to learn more.
	The strategies we apply in learning a
	second language have produced good results,
	which is that we can learn with the second
	language.

Table 4.10 Themes and Subthemes Reflecting Acquisition of Attitudes towards

Global Citizenship (cont.)

	· · · · · · · · · · · · · · · · · · ·
	Participants' Opinion(Subthemes)
	<ul> <li>We also use this second language to communicate with friends from other countries. This makes other things in life interesting for me.         I enjoy learning and work hard in my learning process because bilingual education here shows us the benefit of learning. I am more enlightened and I can flow in discussions     </li> </ul>
	with everyone.
Independence	Independence in communication, thinking
Independence	
ระ เกาลัยรัง	and acting I have seen myself gradually being independent with learning and using a second language. Before my studies in a bilingual school, I was not able to speak to other students who are not from Thailand.
	• I depended on others to help me communicate and even do other things online that are not in my local dialect, but after learning a second language, I am independent in my conversations and other things I do.

Table 4.10 Themes and Subthemes Reflecting Acquisition of Attitudes towards Global Citizenship (cont.)

Global Citizenship (cont.)	
Themes	Participants' Opinion(Subthemes)
	• With a second language, I can think
	and act without depending so much on others
	because I have been exposed not only to a
	second language which makes things easier
	but a broad thinking.
	• I can make my own judgments after
	reflection and thinking, and I can defend my
	judgement. I am independent because I have a
	broad I depended on others to help me
	communicate and even do other things online
	that are not in my local dialect, but after
	learning a second language, I am independent
	in my conversations and other things I do.
Integrity	Honesty, fairness, principle and
428	balance
neine	• Learning a second language has helped
ั คียรังสิ	me learn about the fact that honesty is a
Integrity	universal moral expectation and value. Honest
	people have always been praised and seen as
	models in all cultures. I want to be like them.
	I have learned in English and Thai that
	being honest is a virtue that the world needs.
	• Second language learning has helped
	me to be open minded and understand that
	fairness should be applied in all
	circumstances.

Table 4.10 Themes and Subthemes Reflecting Acquisition of Attitudes towards Global Citizenship (cont.)

Themes	Participants' Opinion(Subthemes)
	Second language program from the IB
	program and now the Cambridge program has
	developed the attitude of being principled and
	balanced. I have realized that to be a global
	citizen and a good person, I need these values.
Respect	Respect of oneself and others
	• Contact with the external world
	through a second language has taught me that
	to be valued, I have to respect myself first in
	the place so that I can gain the respect of others
	and preserve my dignity.
	As a result of being open minded since I
	started studying in a bilingual school, I see
	others as myself and I think everyone deserves
8	to be respected.
Tolerance	Tolerance towards other people and the
280	diversity in the world
Tolerance	• Learning a second language and being in contact with people from diverse cultures
	has opened my mind to accepting others and
	tolerating everyone.
	I am sensitive about differences and
	diversity in the world from my learning a
	second language and this goes a long way to
	help me in making and keeping friends from
	other nationalities.

Table 4.10 Themes and Subthemes Reflecting Acquisition of Attitudes towards

Global Citizenship (cont.)

### 4.2.2 Themes and Sub-Themes Reflecting Professional Skills for Global Citizenship

The themes and subthemes reflecting professional skills for global citizenship were as follows: research skills (planning and carrying out research), communication skills (clearer understanding of speaking, listening, reading and writing), thinking skills (cognitive thinking, applying and synthesizing), self-management skills (time management and situation management) and social skills (cognitive thinking, applying and synthesizing).

 Table 4.11 Themes and Subthemes Reflecting Acquisition of Professional

 Skills for Global Citizenship

Themes	Participants' Opinion(Subthemes)	
Research Skills	Planning and Carrying out Research	
	• Second language learning has helped	
	me develop my research skills. This is because	
	I have to carry a lot of research work to be able	
	to understand concepts in both languages.	
L'a	• The process of researching as taught by	
• The process of researching as taught our school has helped me a lot in gett information. First involves formulat questions then observations, collecting of		
الأراعية	information. First involves formulating	
ายรงส	questions then observations, collecting data	
	and recording them and analyzing.	
Communication skills	Clearer understanding of speaking,	
	listening, reading and writing	
	• Second language learning has	
	enhanced my understanding of	
	communication which is at the heart of	

Themes	Participants' Opinion(Subthemes)
	<ul> <li>second language learning. It has developed the basic skills of listening, reading, writing and speaking.</li> <li>Understanding and communicating with a second language involves listening to information, speaking clearly and understanding and reading. With the bilingual program I have been a good communicator</li> </ul>
Thinking Skills	CognitiveThinking,ApplyingandSynthesizing• Studying and using a second languageand using a second language to study one'scourses requires the development of thinkingskills.Second this is seen in applying,
<sup>2</sup> พาววิทยาลัยรังสิ	<ul> <li>synthesizing and evaluating situations with the</li> <li>My bilingual education program has made me use an additional language to develop cognitive thinking in all subjects as I need to think in another language not my mother tongue.</li> </ul>
Self-management	<ul> <li>Time and Situation Management</li> <li>I have improved in time management</li> <li>from my second language learning. I realize</li> <li>the difference in culture as</li> </ul>

Table 4.11 Themes and Subthemes Reflecting Acquisition of Professional

Skills for Global Citizenship (cont.)

Skills for Global Citizenship (cont.)
---------------------------------------

Themes	Participants' Opinion(Subthemes)
	• regards keeping to time and this has
	influenced the way I treat time.
Social skills	<ul> <li>influenced the way I treat time.</li> <li>Exposure to other cultures through a second language has broadened my mindset in my planning and execution. I can manage situations</li> <li>Respecting and Cooperating with others <ul> <li>Social skills are basic in communicating with others. From learning and using a second language, I have learnt and acquired a lot of social skills such as cooperating in the classroom and outside the classroom</li> </ul> </li> </ul>
	countries too has taught me to be respectful

In conclusion, qualitative findings derived from the interviews as shown in the tables above are used to support quantitative findings.

#### **CHAPTER 5**

#### **CONCLUSION AND RECOMMENDATIONS**

This chapter discusses the results of data analysis, conclusions, limitations and recommendations for future studies.

#### **5.1 CONCLUSION**

The purpose of this study was to investigate the extent to which students of a bilingual education program have acquired positive attitudes and professional skills through the learning of a second language in line with the philosophy of international education at a bilingual education provider in Thailand. Hence this study set out to test two hypotheses, which firstly states that second language learning in a bilingual education provider enhances the acquisition of bilingual students' attitudes for global citizenship at a high level. Secondly, second language learning in a bilingual education provider enhances the acquisition of bilingual students' professional skills for global citizenship at a high level.

The hypotheses were generated based on the arguments that contact with a second language impacts a certain change in the individual. Such contacts may take place formally or informally. Formally, an individual undergoes learning at a formal bilingual program, while informally, such learnings occur with interactions on social media, peers and other settings. It was thus argued that second language learning particularly in a formal setting helps build up bilingual learners' positive attitudes and professional skills (Siegel, 2003; Dewaele & Wei, 2013; Morales et al., 2013) because it takes place within a social context where interactions with teachers, other adults, or peers create the connection to a second language. Second language learning for six years in a formal bilingual setting was an independent variable in this study while the dependent variables were the extent to which bilingual students acquire attitudes for

global citizenship (dependent variable 1) and professional skills for global citizenship (dependent variable2).

#### 5.1.1 Hypothesis 1

The data from the quantitative findings confirmed the first hypothesis which stated that second language learning enhances the acquisition of bilingual students' attitudes for global citizenship at a high level. All the items that measured the 12 attitudinal components of the 158 bilingual students who participated in this study contained mean scores above 4.10, which reads 'very high'. It means that all students, who were male and female, whose age ranged from 11 to 20, and who were either from Thailand or China, between grades 7 and 12 with English, Thai, or Chinese as their first and most spoken language, studying minimally six years in the bilingual education provider have acquired attitudes for global citizenship, as promised by the IB (2010). In addition, the qualitative findings support the quantitative outcomes, discussed in details below.

#### 5.1.1.1 Appreciation

The first component of attitude for global citizenship, which is appreciation ( $\bar{x} = 4.59$ ), was justified by the response from the interviewees that the learning a second language in a bilingual setting connects them to not only a language but also a culture that initiates and sustains curiosity to discover more about the world, and the more they explore, the more they appreciate the world. In addition, learning foreign languages (English, Thai and Mandarin) and studying in both English and Thai have helped them to appreciate people of the world. Meeting foreign teachers in the process of second language learning and studying with the second language learners understand that everyone is unique and being a bilingual has opened up ways to make new friends and appreciate other people. In line with Peterson and Bronwyn (2003), the study of a second language helps students to gain knowledge and understanding of a wider world and appreciate this world view and the people in the world. Studying other languages, aids

students in gaining knowledge and understanding the cultures where such languages are spoken. Students cannot be proficient in the language until they have also understood and mastered the cultural contexts of the usage of such language (National Standards in Foreign Language Education Project, 1996, p. 27).

#### 5.1.1.2 Commitment

The second component of attitude for global citizenship, which is commitment  $(\bar{x} = 4.62)$ , that applying all the strategies in learning a second language, and consequently being able to study with two different languages has made them to be more serious since it is more challenging and requires much effort to be better in their own learning. It is not easy to study with two languages, especially with a second language. It needs persevering and constant practice, so this has also helped them to learn how to persevere in real life situations. Studying all courses in two languages requires great self-discipline. It requires first understanding the language sepecially that is not their first language but just a studied language. It requires self-discipline and being responsible is really necessary to be successful in studying with two languages as well as doing their homework and other duties and taking other responsibilities seriously. These particular aspects are parallel with Myles's (2002) assertion that study with a second language enhances the learners' commitment to hard work and studies.

## 5.1.1.3 Confidence

The third component of attitude which is confidence had a mean score of ( $\bar{x} = 4.45$ ). The findings confirmed that second language learning in a formal setting highly impacts the acquisition of the attitude of confidence on second language learners. This was justified by the responses from the interviewees that learning a second language and studying in both English and Thai for 8 years has developed that confidence feeling in what they can do as learners. The study of all courses in a language one has learnt is itself a risk because he or she has to take examinations in that language you have learnt. Learners also study about having the courage to take risks as one of the profiles learners should have. The findings are in line with Mason's (2018) opinion that students who

speak two languages possess higher self-esteem than students who only speak one language, which can go a long way in approaching new challenges at school and work.

#### 5.1.1.4 Cooperation

The fourth component of attitude which is cooperation ( $\bar{x} = 4.58$ ) was justified by the responses from the interviewees that that learning a second language in a bilingual setting with the IB and Cambridge curriculum, and being exposed to the strategies of second language has made them to be able to work together and participate more in team work. They contribute to class discussions and work with others in teams to achieve the teams' goals with the help of a bilingual environment that inspires. The findings also agree with the assertions of Mason (2018), Iwai (2000), Lancaster & Strand (2001) that confidence, self-esteem, social skills in language use are promoted by second language learning, and academic achievement among students who also derive positive social benefits in the spirit of cooperation with their peers in the classroom are also enhanced by second language learning.

#### 5.1.1.5 Creativity

The fifth comportment of attitude which is creativity ( $\bar{x} = 4.64$ ) was justified by the responses from the interviewees that their level of creativity has increased since they started learning a second language with all the strategies of language learning in a bilingual school some 7 years ago because they could use their imaginations to come up with works in both languages and in their approaches to problems and dilemmas. The findings agree with the opinions of Ghonsooly and Shoghi, (2012) that on one hand, cognitive functions, such as cognitive flexibility, planning and working memory are enhanced by second language learning. On the other hand, the strength and powers of these functions enable creativity. Therefore, the levels of creativity that will be attained depends on the improvement of the cognitive functions.

#### 5.1.1.6 Curiosity

The sixth component of attitude which is curiosity ( $\bar{x} = 4.63$ ) was justified by the response from the interviewees that the more they use vocabulary from the second language they learned, the more curious they are to find out where these words came from, for example, they found out that some English words are of Latin and French origin. Learners are curious about the nature of their own learning from the ability to speak and study with two languages. Being more exposed to the world from the study of two languages brings out a natural curiosity in learners to explore other languages. The bilingual program they go through has brought them in contact with other people and cultures. Interactions and learnings create a great curiosity in them to explore more on what humans have in common and what the differences are. The findings also agree with Kharkhurin's (2010) position that creativity is enhanced by cognitive functions, so it can be expected that developments in bilinguals' cognitive functions facilitate creative abilities.

#### 5.1.1.7 Empathy

The seventh component of attitude which is empathy ( $\bar{x} = 4.64$ ) was justified by the response from the interviewees that through their learning of a second language in a formal bilingual setting, they have come to learn more about the world and its people. They have realized that we are all the same and that has made them feel more empathetic and placing themselves in the other person's situation. Whatever happens to another, may have been them. They understand from contacts with the friends from other countries that people think differently. Language also reveals emotions and studying the language and culture of others have made me feel and understand what they feel and the way they do. The findings are in line with Mower's (2018) position which states that learning a second language creates empathy in the learner due to its exposure to the other cultures of the world.

#### 5.1.1.8 Enthusiasm

The eighth component of attitude which is enthusiasm ( $\bar{x} = 4.64$ ) was justified by the responses from the interviewees that second language learning in a bilingual program has developed in the them that intense eagerness and interest because the more they use a second language to communicate with people, the more they make new friends both online and on face to face basis, the more interesting it is for them to learn more. This also makes other things in life interesting for them. The learners enjoy learning and working hard in their learning process because bilingual education shows them the benefits of learning. They testify to being more enlightened and being able to flow in discussions with everyone. The findings also agree with Mason (2018) suggestion, that learning a second language arouses in the learner some enthusiasm to be perfect in such language and communicate through it.

#### 5.1.1.9 Independence

The ninth component of attitude which is independence ( $\bar{x} = 4.67$  (SD = 677) was justified by the response from the interviewee that they have seen themselves gradually being independent due to contacts with a second language which involves learning the language and using it in studies and in real life. Some said that before their studies in a bilingual school, they were not able to speak to other students who are not from Thailand. Some learners had depended on others to help me communicate and even do other things online that are not in their local dialect, but after studying a second language, they are independent in their conversations and other things they do. With a second language, they can think and act without depending so much on others because they have been exposed not only to a second language which makes things easier but a broad thinking. They can make my own judgments after reflection and thinking and I can defend my judgement. They are independent because they have a broad mind that helps them think in a balanced way after being exposed to other languages and cultures. The findings are in line with White (2008) assertion that learning a foreign language and being able to use it boast learners' independence.

#### 5.1.1.10 Integrity

The tenth attitude which is integrity ( $\bar{x} = 4.68$ ). The findings confirmed that second language learning in a formal setting highly impacts the acquisition of the attitude of appreciation on second language learners. This was justified by the response from the interviewees that learning and using a second language and subsequently, contacts with a second language has helped them learn about the fact that honesty is a universal moral expectation and value. Honest people have always been praised and seen as models in all cultures. They wished to imitate these models. They have learned in English and Thai that being honest is a virtue that the world needs. Second language learning has helped them to be open minded and understand that fairness should be applied in all circumstances. Second language programs from the IB program and the Cambridge program have developed the attitude of being principled and balanced. They have realized that to be a global citizen and a good person, they need these values. The findings also correspond with Lancaster & Strand (2001) opinion, that integrity can be built on experience and contact with other cultures through learning a second language.

#### 5.1.1.11 Respect

The eleventh component of attitude which is respect ( $\overline{x} = 4.61$ ). The findings confirmed that second language learning in a formal setting highly impacts the acquisition of the attitude of respect on second language learners. This was justified by the responses from the interviewees that contact with the external world through learning and using a second language has taught them that to be valued, they have to respect themselves first so that they can gain the respect of others and preserve their dignity. As a result of being open minded, they see others as myself and they think everyone else deserves to be respected. The finding is in line with De Valoes (2014), that the study of foreign languages teaches and encourages respect for other peoples: it fosters an understanding of the interrelation of language and human nature.

#### 5.1.1.12 Tolerance

The twelfth component of attitude which is tolerance ( $\bar{x} = 4.55$ ). The findings confirmed that second language learning in a formal setting highly impacts the acquisition of the attitude of tolerance by second language learners. This was justified by the response from the interview that learning and using a second language has exposed them to people from diverse cultures and has opened their mind to accepting others and tolerating everyone. They have become sensitive about differences and diversity in the world from learning a second language and this goes a long way to help me in making and keeping friends from other nationalities. The findings also agree with Dewaele & Wei (2013), that knowledge of a second language and the experience of having to cope with learning a second language increases learners' tolerance. In sum, knowing many languages and having the experience of striving to survive in a foreign nation with a foreign language and culture makes individuals more tolerant.

#### 5.1.2 Hypothesis

The data from the quantitative findings confirm the second hypothesis which stated that second language learning enhances the acquisition of bilingual students' professional skills for global citizenship at a high level. All the items that measured the five components of students' professional skills for global citizenship contained mean scores which were higher than 4.10, meaning "very high". It means that all students, male and female, whose age ranged from 8 to 20 and who were either from Thailand or China, between grades 7 to 12, with English, Thai or Chinese as their first and most spoken language, studying minimally 6 years in the bilingual education provider have acquired professional skills for global citizenship, as promised by the IB (2010). In addition, the qualitative findings support the quantitative data discussed in details below.

#### 5.1.2.1 Thinking Skill

The first professional skill which was thinking skill ( $\overline{x} = 4.70$ ) was justified by the response from the interviewee that learning a second language from their kindergarten years with the various strategies recommended for that stage till this stage where they are using the second language to study their courses needs the development of thinking skills. Learning a second language in a bilingual education program has made them use an additional language to develop cognitive thinking in all subjects as they need to think in another language not their mother tongue. The findings also agree with previous studies that when compared to monolingual learners, second language learners exhibit more creativity and are better at solving complex problems (Bamford & Mizokawa, 1991), that learners of second language exhibit greater cognitive flexibility, greater problem solving skills and show higher order in thinking skills (Hakuta 1986), that the study of a second language enhances learner's understanding of how language itself works and their ability to manipulate language in the service of thinking and problem solving (Cummins 1981) and that early language study results in greater skills in divergent thinking and figural creativity. (Landry 1973).

#### 5.1.2.2 Research Skills

The second professional skill which was research skill ( $\bar{x} = 4.722$ ) was justified by the responses from the interviewees that second language learning a bilingual school which uses the IB curriculum has helped them develop their research skills. This is because they carry out a lot of research work with the inquiry based learning promoted by the IB PYP programme to be able first of all, to understand the second language, and be able to use it in their learning and finally to understand concepts in both languages. The process of researching as taught by the school has helped them a lot in getting information. First involves formulating questions then observations, collecting data and recording them and analyzing. The findings also agree with the affirmations of Rogde, Melby-Lervåg & Lervåg, (2016) that research skills are better developed when learners study a second language.

#### 5.1.2.3 Communication Skill

The third professional skill which was communication ( $\bar{x} = 4.75$ ) was justified by the response from the interview that communication is at the heart of second language learning. The strategies of second language involve at the various stages, the development of four components of communication, namely; listening, reading, writing and speaking. Understanding and communicating with a second language involves listening to information, speaking clearly and understanding and reading. With the bilingual program they have been good communicators. The findings are in line with the positions of Garfinkel & Tabor (1991), which affirms that there is highly a positive correlation between foreign language study and improved reading scores and other communication skills for averagely intelligent children and children below average intelligence. This is also in line with the position of Lapkin, Swain, Rowen &Hart (1990) and Ratte (1968) which opines that foreign language learners possess better skills for listening and sharper memories than their monolingual peers.

#### 5.1.2.4 Self-management Skill

Fourth, self-management skill ( $\bar{x} = 4.70$ ) was justified by the response from the interviewees that learning a second language has helped them improve in their time consciousness due to contact with other cultures where keeping to time is essential. They noted that the stages in the second language learning process also made them understand the concept of how time is relevant in the acquisition of the skills needed in using their second languages. Exposure to other cultures through a second language has broadened their mindset in planning and execution. They can manage situations. The findings are in agreement with Robin's (2001) position that interaction with other cultures and learning a second language improve a learner's self- management skills.

#### 5.1.2.5 Social Skill

Finally, social skill ( $\bar{x}$ = 4.73) was justified by the response from the interviewees that social skills were basic in communicating with foreigners. From

learning and using a second language, they have learned and acquired many social skills both inside and outside of the classroom. Since they started studying a second language with all the strategies of second language learning at various stages in a bilingual school and using a second language to learn, they have come in contact with friends from other countries and have practiced the social skills they have acquired. Learning a second language and using it in the context of a bilingual school where they have other students and teachers from other countries have taught them to be respectful and polite in all social situations. The findings also agree with studies from the Center for Applied Linguistics, by Peterson, & Bronwyn, (2003) that the benefits to society are numerous. Americans who are fluent in other languages show improved social skills, global communication, and also demonstrate interest in global politics and security.

In conclusion, the aim of this study was to investigate the extent to which bilingual students have acquired attitudes and professional skills for global citizenship through the learning of a second language at a bilingual education provider in Thailand. Based on related literature reviews, the researcher hypothesized that second language learning enhances the acquisition of bilingual students' attitudes for global citizenship at a high level; and second language learning enhances the acquisition of bilingual students' professional skills for global citizenship at a high level. Mixed method was used in this investigation where quantitative data were primary sources validated and confirmed by qualitative findings. All items in the questionnaire that measured the components of attitudes and professional skills for global citizenship had more than 4.10 on the mean score which rated very high; therefore, both hypotheses were confirmed.

The semi structured interview gave explanation of why participants hold the view that second language learning in a formal bilingual education setting highly enables learners to acquire attitudes and professional skills for global citizenship. Consequently, the findings from the investigation supports the arguments in the present study that second language learning for minimally six years in a formal bilingual setting will enhance bilingual students' attitudes and professional skills for global citizenship at a high level.

## **5.2 LIMITATION AND RECOMMENDATIONS**

A major limitation of this study was the number of participants for the semi structured interview. Since participation was on a voluntary basis, only ten students volunteered. Despite the hypotheses of the study being confirmed by the findings from quantitative data and supported by qualitative data from the interviews and thus making references for the study, this study could be replicated in different social and academic contexts. There should be repeated studies on the level of the acquisition of second language on learners' attitudes and professional skills. With the -update of skills and sub-skills in second language learning through the IB (2020), There could also be in depth studies on individual's attitudes and professional skills.

## **5.3 IMPLICATION OF THE STUDY**

All the research gaps aforementioned have been filled by this study. The first research gap was that there are only few studies into this area (Siegel, 2009; Dewaele & Wei, 2013; Morales et al., 2013), which investigated the acquisition of attitude and professional skills for global citizenship influenced by second language in other social contexts but not in a formal bilingual education setting. The findings from this study demonstrated that attitudes and professional skills are acquired in the process of second language learning in a formal bilingual setting. The second research gap was that these researches studied one aspect of skills and attitudes or another, not attitudes and skills holistically. This study focused on all twelve components of attitudes and the five components of professional skills as indicated by the IB (2010). The third research gap was that criticisms of bilingualism raise the question of the extent to which young bilingual learners in a formal bilingual education program can acquire the necessary attitudes and skills for global citizenship. This study investigated the extent to which second language learning in a formal bilingual setting aids the acquisition of attitudes and professional skills and the findings portrayed a very high degree of acquisition of attitudes and professional skills.

### References

- Abelson J, & Reyes V, (1998). Substrate recognition and splice site determination in yeast RNA. *Cell. 18*(4), 719-730. Doi: 10.1016/0092-8674(88)90230-9. PMID: 3141064.
- Abutalebi, J., Della P., Green, D., Hernandez, M., Scifo, P., Keim, R., Cappa, S. & Costa A. (2012). *Bilingualism Tunes the Anterior Cingulate Cortex for Conflict Monitoring*. California: Cereb Pub.
- Ackerman, P. (1988). Determinants of Individual Differences During Skill Acquisition: Cognitive Abilities and Information Processing. *Journal of Experimental Psychology: General*, 117(3), 288–318.
- Adams, W. (2015). Conducting Semi-Structured Interviews. Boston: Havard Business School.
- Agirdag, O. (2014). The long-term effects of bilingualism on children of immigration:
   Student bilingualism and future earnings. *International Journal of Bilingual Education and Bilingualism*, 17. 449-464. 10.1080/13670050.2013.816264.
- Ahangari, S., & Zamanian, J. (2014). Intercultural Communicative Competence in Foreign Language Classroom. *International Journal of Academic Research in Business and Social Sciences*. 4. 10.6007/IJARBSS/v4-i11/1265.
- Ajzen, I & Icek, M. (1993). Attitude theory and the attitude-behavior relation. Belin: Walter de Gryuter Pub.
- Alba, R., & Shin, H. (2002). The Economic Value of Bilingualism for Asians and Hispanics. Sociological Forum, 2(1), 254 – 275.
- Alba, R., Logan, J., Lutz, A., Stults, B., (2009). Only English by the Third Generation? Loss and Preservation of the Mother Tongue Among the Grandchildren of Contemporary Immigrants. *Demography*, 39. 467-84.
- Allan, W., & Moosung, L. (2018). Weaving Curriculum Connections in International Baccalaureate IB Schools. *Peabody Journal of Education* 93, 468-485.
- Allen, C., Machleit, K., & Kleine, S. (1992). A Comparison of Attitudes and Emotions as Predictors of Behavior at Diverse Levels of Behavioral Experience. *Journal* of Consumer Research, 18. 493-504.

- Altinay, H. (2010), *The Case for Global Civics, Global Economy and Development Working Paper 35*, Washington, Dc: The Brookings Institution.
- Amin, T. (2014), Language of Instruction and Science Education in The Arab Region: Toward A Situated Research Agenda, The World of Science Education. Arab States: Sense Publishers.
- Anderson, J. (1982). Acquisition of Cognitive Skill. *Psychological Review*, 89(4), 369–406.
- Anderson, C. (1995). The Stages of Life: A Groundbreaking Discovery: The Steps to Psychological Maturity. New York: Atlantic Monthly Press.
- Andy, F. (2009). Discovering Statistics Using Spss. London: Sage Publications Ltd.
- Ariely, D. (2011). Consensus On Building a Better America—One Wealth Quartile at A Time. *Perspectives On Psychological Science*, 6, 9–12.
- Arlean C., & Clayton, M. (2003). The Cultural Study of Music, A Critical Introduction. New York: Routledge Press.
- Arnett, J. (2002). The Psychology of Globalization. *American Psychologist*, 57(10), 774–783. Https://Doi.Org/10.1037/0003-066x.57.10.774.
- Baker, C. (2017). Foundations of Bilingual Education and Bilingualism (3<sup>rd</sup> Ed.). Bilingual Education and Bilingualism 27. Multilingual Matters Ltd.
- Baldwin, J. (1894). *Mental Development in The Child and The Race: Methods and Processes*. New York And London: Macmillan.
- Bamford, K., & Mizokawa, D. (1991) Additive-Bilingual (Immersion) Education:
  Cognitive and Language Development Language Learning, 11(7).
  Doi.org/10.1111/j.1467-1770.1991.tb00612.x
- Barac, R., Bialystok, E., Castro, C., & Sanchez, M. (2012). The Cognitive Development of Young Dual Language Learners: A Critical Review. *Early Childhood Research Quarterly*, 29(4), 699–714.
- Barde, M., & Barde, P. (2012). What to Use to Express the Variability of Data: Standard Deviation or Standard Error of Mean. *Perspectives in Clinical Research*, 3(3), 113–116. Https://Doi.Org/10.4103/2229-3485.100662.

- Bastable, S., & Dart, M. (2007) *Developmental Stages of the Learner*. Massachusetts: Jones and Bartlett Publishers.
- Baumrind, D., Larzelere R., & Cowan, P. (2018). Ordinary physical punishment: is it harmful? Comment on Gershoff (2002). *Psychol Bull 128* (4), 580–9. Doi:10.1037/0033-2909.128.4.580.
- Benati, A. (2010). Grammar Instruction and Processing Instruction in Second Language Acquisition. *Journal of Applied Linguistics*, 26, 43-58.
- Ben-Zeev, S. (1977). The Influence of Bilingualism On Cognitive Strategy and Cognitive Development. *Child Development*, 48(3), 1009–1018.
- Bialystok, E. (1986). Factors in the growth of linguistic awareness. *Child Development*, 57, 498-510.
- Bialystok E. (1988). Levels of Bilingualism and Levels of Linguistic Awareness. Developmental Psychology, 24(4), 560–567.
- Bialystok, E. (2001). Metalinguistic Aspects of Bilingual Processing. *Annual Review* of *Applied Linguistics*, 21, 169 181. Doi:10.1017/S0267190501000101.
- Bialystok, E., Craik, F., & Luk, G. (2012). Bilingualism: Consequences for Mind and Brain. *Trends in Cognitive Sciences*, 16(4), 240–250.
- Bialystok, E & Kroll, J. (2013). Understanding the consequences of Bilingualism for Language Processing and Cognition. *Journal of Cognitive Psychology*, 25(5), Pages 497-514.
- Bista, K. (2016). Recurring Themes Across Fractal Issues Facing International Students: A Thematic Analysis of 2016 Dissertation and Thesis. *Journal of International Students*, 7(4), 1135 – 1151.
- Blair, I. (2002). The malleability of automatic stereotypes and prejudice. *Personality and Social Psychological Review*, *6*, 242-261.
- Blom, E., Kuntay, C., Messer, M., Verhagen, J. & Leseman, P. (2014). The Benefits of Being Bilingual: Working Memory in Bilingual Turkish-Dutch Children. *Journal of Languages*, 12(5),105-119. Doi: 10.1016/J.Jecp.2014.06.007.

- Blom, E., Boerma, T., Bosma, E., Cornips, L., & Everaert, E. (2017). Cognitive Advantages of Bilingual Children in Different Sociolinguistic Contexts. *Frontiers in Psychology*, 10, 33-89.
- Bodenhausen, G. & Gawronski, B. (2013). The associative—Propositional evaluation model: Operating principles and operating conditions of evaluation. In J. W. Sherman, B. Gawronski, & Y. Trope (Eds.), *Dual-process theories of the social mind* (p. 188–203). The Guilford Press.
- Bond, H., & Lai, T. (1986). Embarrassment and Code-Switching into A Second Language. *The Journal of Social Psychology*, 126(2), 179–186.
- Bonifacci, P., Giombini, L., Bellocchi, S. & Contento, S. (2011). Speed of Processing, Anticipation, Inhibition and Working Memory in Bilinguals. *Developmental Science*. 14(1), 256-69.
- Brandsford J., (1990). *Human Cognition; Learning, Understanding and Remembering*. Belmont: Wardsworth Press.
- Braun, V., & Clarke, V. (2012). Thematic analysis. In H. Cooper, P. M. Camic, D. L. Long, A. T. Panter, D. Rindskopf, & K. J. Sher (Eds.), APA handbooks in psychology®. APA handbook of research methods in psychology, Vol. 2. Research designs: Quantitative, qualitative, neuropsychological, and biological (p. 57–71). American Psychological Association. Https://doi.org/10.1037/13620-004
- Brasileiro, I. (2009). *The effects of bilingualism on children's perception of speech sounds* (Unpublished Doctoral Dissertation). Utrecht University, Netherlands.
- Briñol, P., & Petty, R. (2012). *The history of attitudes and persuasion research*. Boston: United Press.
- Bronfenbrenner, U. (Ed.). (2005). *Making human beings human: Bio-ecological perspectives on human development*. Sage Publications Ltd.
- Brown, S. (2010). *Likert Scale Examples for Surveys*. Retrieved from http://Www.Extension.Iastate.Edu/Ag/Staff/Info/Likertscaleexamples.

- Brown, T. (1994). Towards a hermeneutical understanding of mathematics and mathematical learning. In: P Ernest (ed.). *Studies in Mathematics Education*. London: The Falmer Press.
- Bullock, K. (2011) International Baccalaureate Learner Profile: Literature Review. Cardiff, IBO, International Baccalaureate Organization Review Source for Education. Retrieved from www.Ibo.Org/Research/ Resources/Documents/ Lplitreview Final.
- Caldwell, B. (2013). Leadership in The Creation of World -Class Schools. Doi: 10.4324/9780203465882-12.
- Caldwell, W. (2007). Taking Spanish Outside the Box: A Model for Integrating Service-Learning into Foreign Language Study. *Foreign Language Annals*, 40/3, 463-471.
- Cambridge Global Perspectives (2010). Preview Cambridge International As & A Level. Cambridge. Cambridge University Press.
- Cappellari, L. & Di Paolo, A., (2015) Bilingual Schooling and Earnings: Evidence From A Language-In-Education Reform, Working Paper, No. 32, Università Cattolica Del Sacro Cuore, Dipartimento Di Economia E Finanza (Disce), Milano.
- Carlo, S. (2016). A Different Perspective to Define Language Learning Strategies. International Journal of Research Studies in Language Learning, 6, 10-15.
- Carmichael, L. (1933). Origin and Prenatal Growth of Behavior. In C. Murchison (Ed.), A Handbook of Child Psychology (2<sup>nd</sup> Ed). Rev. (Pp. 31–159). Worcester, Ma: Clark University Press.
- Cherry, K. (2015). Erikson's Stages of Psychosocial Development. *Psychosocial* Development in Young Adulthood, Middle Age, And Old Age, 6(3), 261-300.
- Chin, A., (2015). Impact of Bilingual Education On Student Achievement. *Iza World* Of Labor, 10(1), 125-131.

- Clarke, J., Truly, T., & Phillips, S. (1993). On The Development of Walking as A Limit-Cycle System. In Thelen, E. And Smith L. B. (Eds.), *A Dynamic Systems Approach to Development: Applications* (pp. 71–94). Cambridge, Ma: Mit. Press.
- Clarkson, P. (2007). Australian Vietnamese Students Learning Mathematics: High Ability Bilinguals and Their Use of Their Languages. *Educ Stud Math*, 64, 191. https://doi.org/10.1007/s10649-006-4696-5
- Clore, G, & Schnall, S. (2005). The influence of affect on attitude. In D. Albarracín, B.T. Johnson, & M. P., Zanna (Eds.), *Handbook of attitudes (pp. 437-489)*.Mahwah: Erlbaum.
- Crain, W. (2005). *Theories of Development: Concepts and Applications* (5th Ed.). Upper Saddle. River, NJ: Pearson Education.
- Craith, N. (2012). Narratives of Place, Belonging and Language: An Intercultural Perspective. New York: Palgrave Macmillan.
- Coghill, G. (1980). The Structural Basis of the Integration of Behavior. *Proceedings* Of The National Academy of Sciences, 16, 637–643.
- Comănaru, R. (2009). *The Development of the Bicultural Identity Orientation Scale: Dimensions of Biculturalism*. Edmonton, University of Alberta Press.
- Compernolle, R., Gomez-Laich, M., Weber A. (2016) Teaching L2 Spanish Sociopragmatics Through Concepts: A Classroom-Based Study. *The Modern Language Journal*, 100(1).
- Cooper, J. (2001). Cognitive dissonance theory. *Handbook of theories in social psychology*, 1. 377-397. 10.4135/9781446249215.n19.
- Costa, A., Hernández, M., Costa-Faidella, J., Galles, S., (2009). On The Bilingual Advantage in Conflict Processing: Now You See It, Now You Don't. *Cognition*, 113(1), 135-49.
- Cowan N. (2008). What Are the Differences Between Long-Term, Short-Term and Working Memory? *Progress in Brain Research*, 169, 323–338.
- Craith, N. (2012). *Narratives of Place, Belonging and Language: An Intercultural Perspective*. New York: Palgrave Macmillan.

- Crosbie, V. (2014). Capabilities for intercultural dialogue. *Lang. Intercultural Communication*, *14*(1) 91–107. Doi: 10.1080/14708477.2013.866126
- Cummins, J. (1978). Bilingualism and the development of metalinguistic awareness. J. *Cross-Cult. Psychol*, 9, 131–149.
- Cummins, J. (1981). The Role of Primary Language Development in Promoting Educational Success for Language Minority Students. *Language Journal of Education*, 10(1). Doi:10.13140/2.1.1334.9449.
- Cummins J. (2012). The intersection of cognitive and sociocultural factors in the development of reading comprehension among immigrant students. *Reading and Writing*, 25(8), 1973–1990. Doi: 10.1007/s11145-010-9290-7.
- Dagenais, D., Day, E., & Toohey, K. (2006). A Multilingual Child's Literacy Practices and Contrasting Identities in the Figured Worlds of French Immersion Classrooms. *International Journal of Bilingual Education and Bilingualism*, 9. 10.1080/13670050608668641.
- Dagenais, D., Walsh, N., Armand, F., & Maraillet, E. (2008). Collaboration and coconstruction of knowledge during language awareness activities in Canadian elementary school. *Lang. Aware.* 17, 139–155. Doi: 10,2167/la442.0
- Dalglish, C. (2006). *Leadership: Asia-Pacific* (2nd Edition). Australia: John Wiley and Son.
- Dalton, T. (1995). Mcgraw's Alternative to Gesell's Maturationism. In T. C. Dalton And V. W. Bergenn, (Eds.), *Beyond Heredity and Environment: Myrtle Mcgraw* and The Maturation Controversy. Boulder, Co: Westview Press.
- Darling-Hammond, L., Flook L., Cook-Harvey, C., Barron B., & Osher, D (2020).
  Implications for educational practice of the science of learning development. *Applied Developmental Science*, 24(2), 97-140. DOI: 10.1080/10888691.2018.1537791.
- Dewaele, J., & Wei, L. (2013). Multilingualism, Empathy and Multicompetence. *International Journal of Multilingualism*, 9(4), 352–366.

- Du -nabeitia JA, Carreiras M. (2015). The bilingual advantage: acta est fabula? *Cortex* 73,371–7.
- Eadie, F. (2009). 21st Century Communication: A Reference Handbook (Vols. 1-2).California: A Sage Publications, Inc. Doi: 10.4135/9781412964005
- Eisenberg, N., Guthrie, B., Murphy, S., Shepard, A., Cumberland, I., & Carlo G. (1999). Consistency and Development of Prosocial Dispositions: A Longitudinal Study. *Child Development*, 70, 1360–1372.
- Ehrman, M. 1990: Adult Language Learning Styles and Strategies in an Intensive Training Setting. *Modern Language Journal*, 74, 311-326.
- Eliza, C., Tomasino, B., & Fabbro, F., (2013) Language Brain Representation in Bilinguals with Different Age of Appropriation and Proficiency of the Second Language. *Neuroscience*. https://doi.org/10.3389/fnhum.2019.00154.
- Epstein, J.L. (2009). In School, family, and community partnerships: Your handbook for action (3rd ed.). USA: Corwin Press.
- Fan, P., Liberman, Z., Keysar, B., Kinzler, K., (2015) The Exposure Advantage: Early Exposure to A Multilingual Environment Promotes Effective Communication. *Psychol. Science*, 26(7), 1090-1097.
- Festinger, L. (1957). A theory of cognitive dissonance. Stanford University Press.
- Festinger, L., & Carlsmith, J. (1959). Cognitive Consequences of Forced Compliance. The *Journal of Abnormal and Social Psychology*, 58(2), 203–210.
- Forsman, L., (2012) Investigating the cultural dimension in foreign language education – from transmission of facts to dialogical uptake. *Educational Action Research*, 20(4), 483-496, DOI: 10.1080/09650792.2012.727602.
- Forsman, L. (2010). EFL education in the new millennium: focus on the promotion of awareness of difference and diversity. *Scand. J. Educ. Res.* 54, 501–517. Doi: 10.1080/00313831.2010.508926.
- Frost, R. & Klaman, C. (2016). What Predicts Successful Literacy Acquisition in A Second Language? *Psychological Science*, 24(7), 1243–1252.

- Folke, T., Ouzia, J., Bright, P., Martino, B., & Filippi, R., (2016). A bilingual disadvantage in metacognitive processing. *Cognition*, 150(1). 10.1016/j.cognition.2016.02.008.
- Gaille, L. (2017).14 Pros and Cons of Bilingual Education. *Modern Language Journal*, 74, 311-326.
- Galambos, J., & Goldin-Meadow, S. (1990). The effects of learning two languages On levels of metalinguistic awareness. *Cognition*, *34* (1), 1-56.
- Gans, S. (2017). Attitude and Behaviour in Psychology. *The Journal of Sociology & Social Welfare*, 38, 1-3.
- Galvan, A. (2016). Adolescence Brian Development. Developmental Neuroscience (Vol 2), Tottenham. Nim. Press.
- Garfinkel, A., & Tabor, T. (1991). Elementary School Foreign Languages and English
  Reading Achievement: A New View of the Relationship. *Foreign Analysis Annals*, 24(5). Retrieved from https://doi.org/10.1111/j.19449720.1991.tb00483.x
- Gebauer, S., Zaunbauer, A., & Möller, J. (2013). Cross-language transfer in English immersion programs in Germany: Reading comprehension and reading fluency. *Contemporary Educational Psychology*, 38, 64–74. 10.1016/j.cedpsych.2012
- Gesell, A. (1952). Autobiography. In E. G. Boring, H. S. Langfield, H. Werner and R.
  M. Yerkes (Eds.), A History of Psychology in Autobiography, 4 (pp. 123–142).
  Worcester, Ma: Clark University Press.
- Gentry, M. (2013). Total School Cluster Grouping and Differentiation: A Comprehensive, Research-Based Plan for Raising Student Achievement and Improving Teacher Practices (2nd Ed.). Waco, Tx: Prufrock Press.
- Global Perspectives & Research. (2010). Cambridge, Cambridge University Press.
- Ghonsooly, B. & Shoghi, S. (2012). The Effects of Foreign Language Learning on Creativity. *English Language Teaching*, 5. 10.5539/elt.v5n4p161.
- Gold, B., Kim C., Johnson, N., Kryscio R., Smith C. (2013) Lifelong bilingualism maintains neural efficiency for cognitive control in aging. *The Journal of Neuroscience*, 33, 387–396.

- Goodway, J. (2019). Developmental Trajectories in Early Sport Specialization: A Case For Early Sampling from A Physical Growth and Motor Development Perspective. *Kinesiology Review*, 4, 267-278.
- Goodway, J., Wainwright, N., Whitehead, M., Williams, A., & Kirk, D., (2020) Playful Pedagogy for Deeper Learning: Exploring the Implementation of The Play-Based Foundation Phase in Wales. *Early Child Development and Care*, 190(1), 43-53, Doi: 10.1080/03004430.2019.1653551
- Gottlieb, G. (1997). Synthesizing Nature/ Nurture: Prenatal Roots of Instinctive Behavior. Mahwah, Nj: Erlbaum.
- Greenough, W., Black, J., & Wallace, C. (1993). Experience and Brain Development.In M. H. Johnson (Ed.), *Brain Development and Cognition* (pp. 319–322).Cambridge, Ma: Oxford.
- Grosjean, F. (2010) Bilingual: Life and Reality. In J. Cenoz, B. Hufeisen And U. Jessner (Eds.) Cross-Linguistic Influence in Third Language Acquisition: Psycholinguistic Perspectives, New York: Scott Foresman Addison Wesley.
- Haddock, G., & Maio, G. R. (2008). Attitudes: Content, structure and functions. Hewstone, M. Stroebe, W. & Jonas, K.(Eds.): Introduction to social psychology: A European perspective, 112-133.
- Haddock, G., Lowens, I., Brosnan, N., Barrowclough, C., and Novaco, R. W. (2004).
  Cognitive behaviour therapy for inpatients with psychosis and anger problems within a low secure environment. *Behav. Cogn. Psychother*, 32, 77–98. Doi: 10.1017/S1352465804001055
- Haddock, G., & Maio, G. R. (Eds.). (2004). Contemporary perspectives on the psychology of attitudes. New York: Psychology Press.
- Hakuta, K. (1986). *Mirror of Language; the Debate on Bilingualism*. New York: Basic Inc., 286pp.
- Hambleton, R., & Rovinelli, E., (1977) Analysis of Empirical Data Using Two Logic Latent Trait Model. *British Journal of Mathematical and Statistical Psychology*, 26,195-211.

- Hammond, L., (2019). A License to Teach: Building A Profession For 21<sup>st</sup> Century Schools. New York: Westview Press.
- Harrison L., (2013) Appreciative Inquiry in Teaching and Learning. *Pedagogy*, 143, 1-3.
- Harmon-Jones, E., & Mills, J. (2019). An Introduction to Cognitive Dissonance Theory And An Overview Of Current Perspectives On The Theory. In E. Harmon-Jones (Ed.), *Cognitive Dissonance: Reexamining A Pivotal Theory In Psychology* (P.3–24). American Psychological Association. Doi: 10.1037/0000135-001
- Heredia, R. R. (2011). Hemispheric Asymmetries In Processing L1 And L2 Idioms: Effects Of Salience And Context. *Brain And Language*, *116*(3), 136–150.
- Hermanto, N., (2012). Linguistic And Metalinguistic Outcomes Of Intense Immersion Education: How Bilingual?. International Journal Of Bilingual Education And Bilingualism, 15, 131-145.
- Hemsley G, Holm A, Dodd B. (2014). Better in both? Bilingual intervention in an Australian school context. *Australian Journal of Education*, 58(2), 139-152. Doi:10.1177/0004944114530064.
- Hipfner-Boucher, K., Lam, K., & Chen, X. (2014). The effects of bilingual education on the English language and literacy outcomes of Chinese-speaking children. *Written Language & Literacy*, 17. 10.1075/wll.17.1.06hip.
- Hinrichs, J. (2002). The Effect of The International Baccalaureate Diploma Programme On International Understanding. *Ib Research Notes*, 2(1), 3–9.
- Holmes, Gary & Paswan, Audhesh. (2012). Consumer reaction to new package design. *Journal of Product & Brand Management*, 21, 109-116.
  10.1108/10610421211215553.
- Holmes, E., Corrigan, P., Williams, P., Canar, J., Kubiak, M. (1999). Changing Attitudes About Schizophrenia. *Schizophrenia bulletin*, 25, 447-56. 10.1093/oxfordjournals.schbul.a033392.

- Homer C., Klatka K., Romm D. (2008). A review of the evidence for the medical home for children with special health care needs. *Pediatrics*, 122, e922–e937.
- Howe, L., & Krosnick, J., (2017). Attitude Strength. *Annual Review of Psychology*, 68, 10-13.
- Hurajova, A. (2015). An Overview of Models of Bilingual Education. Mediterranean *Journal of Social Sciences*, 10,186-188.
- Haynes, J. (2018). *Getting Started with English Language Learners: How Educators Can Meet the Challenge*, Oryx Press: Virginia.
- Ignatius, A. (2017 We need People to Lean into the Futrure. *Havard Business Review*, 94–100
- Ingrid, S. & Gutman, L, (2013) The impact of non-cognitive skills on outcomes for young people. *Education Endowment Foundation Journal*, 59(22).
- International Baccalaureate (2004). Diploma Programme Assessment Principles And Practice. Cardiff, Uk.
- International Baccalaureate (2006). *Ib Learner Profile Booklet*. Cardiff: International Baccalaureate Organization.
- International Baccalaureate (2008). *Towards A Continuum of International Education*. Cardiff: International Baccalaureate Organization.
- International Baccalaureate (2009a). Request for Proposals: A Study of Successful Practices in The Ib Programme Continuum. New York: International Baccalaureate Organization.
- International Baccalaureate (2009b). *The Primary Years Programme: A Basis For Practice*. Cardiff: International Baccalaureate Organization.
- International Baccalaureate (2010). *Ib World Schools Statistics*. Cardiff: International Baccalaureate Organization.
- International Baccalaureate (2012). *International Education How Do You Define "International Education"? Geneva:* International Baccalaureate Organization.

- Israel, Ronald (2012), What Does It Mean to Be a Global Citizen? Kosmos Journal For Global Transformation, Kosmosjournal.Org, Spring|Summer. Retrieve from http://www.Kosmosjournal.Org/Article/What-Does-It-Mean-To-Be-A-Global Citizen.
- Iwai K. (2000) A contribution to the evolutionary theory of innovation, imitation and growth. *Journal of Economic Behavior & Organization*, 43(2), 167-198.
- James, K (2005). International Education: The Concept, And Its Relationship To Intercultural Education. Journal of Research in International Education, 4(3), 313–332.
- Javier, R., Barroso, F., &Munoz, M, (1993) Auto-Biographical Memory in Bilinguals. Journal of Psycholinguistic Research, 22, 319-338.
- Joanna, T. (2012) Linguistic Structures, Situation and Politeness: Requests in Finnish As A Second Language Textbooks and in Authentic Service Encounters. Phd University of Helsinki. Helsinki: Unigrafia Press.
- Jon, A. (1991). Response strategies for coping with the cognitive demands of attitude measures in surveys in *Journal of Analytic Psychology*, 5(3), Special Issue: Cognition and Survey Measurement Pages 213-236 https://doi.org/10.1002/acp.2350050305
- Jonas, K., Broemer, P., & Diehl, M. (2011). Attitudinal Ambivalence. *European Review of Social Psychology*, 11, 35-74. 10.1080/14792779943000125.
- Johnson, M. (2003). A Philosophy of Second Language Acquisition. *Second Language Acquisition*, 15, 1-207.
- Johnson, R. & Christensen, L. (2014). *Educational Research Quantitative, Qualitative, And Mixed Approaches* (5<sup>th</sup> Ed.). California: Sage Publication.
- Kegan, R., & Lisa L. (2001). *How the Way We Talk Can Change the Way We Work:* Seven Languages For Transformation. San Francisco: Jossey-Bass.

- Kara, N., Firestone, R., Kalita, T., Gawande, A., Kumar, V., Kodkany, B., Saurastri, R., Pratap Singh, V., Maji, P., Karlage, A., Hirschhorn, L., Semrau, K., & Better Birth Trial Group (2018). Update of Kara Et Al., The Better Birth Program: Pursuing Effective Adoption and Sustained Use of the Who Safe Childbirth Checklist Through Coaching-Based Implementation in Uttar Pradesh, India. *Global Health, Science and Practice, 6*(1), 225–226.
- Kabir, S M. (2016). Of Motivation and Learning English: A Perspective on EFL Students in Bangladesh, 12, 139. 10.3329/iiucs.v12i0.30587.
- Kendra, M. (2020). Projection bias in environmental attitudes and behavioral intentions. (2020). Grolleau, Gilles; Clot, Sophie; Ibanez, Lisette. In: Working Papers. Repec:hal:wpaper:hal-02874044.
- Kharkhurin, A. V. (2010). Bilingual verbal and nonverbal creative behavior. *International journal of bilingualism*, 14(2), 211-226. https://Doi.Org/10.1177/1367006910363060
- Kulkarni, A. (2013). Validity and Reliability of English and Marathi Oswestry Disability Index in Indian Population, *Spine*, *38*(11), 662-668.
- Krosnick, J. (1991) Response strategies for coping with the cognitive demands of attitude measures in surveys in *Journal of Analytic Psychology*, 5(3), Special Issue: Cognition and Survey Measurement Pages 213-236 https://doi.org/10.1002/acp.2350050305
- Lagos, T. (2002). *Global citizenship-Towards a definition*. Retrieved May, 20, 2007, http://depts.washington.edu/gcp/pdf/globalcitizenship.pdf.
- Landry, R. (1973). The Relationship of Second Language Learning and Verbal Creativity. *The Modern Language Journal*, *57*(3). https://doi.org/10.1111/j.1540-4781.1973.tb04676.x.
- Lamb, M. (2013). Your Mum and Dad Can't Teach You: Constraints on Agency Among Rural Learners of English in Indonesia. *Journal of Multilingual and Multicultural Development*, 34, 14–29.
- Lantolf, James. (2000). Introducing Socio-Cultural Theory. Sociocultural Theory And Second Language Learning, 10, 1-26.

- Lancaster K. & Strand C. (2001). Using the team-learning model in a managerial accounting class: An experiment in cooperative learning. *Issues Account. Educ.* 16 549–567 10.2308/iace.2001.16.4.549
- Lanza, E. (1997). *Mixing in Infant Bilingualism: A Sociolinguistic Perspective*. Oxford; Clarendon Press.
- Lapkin, S., Swain, M., Rowen, N., & Hart, D. (1990). The role of mother tongue literacy in third language learning. *Language, Culture and Curriculum*, 3, 65-81. 10.1080/07908319009525073.
- Lavine, Z. (1992) Teacher Student Style Wars in Language Classroom: Research Insight And Suggestion, *Adfl Bulletin*, 23(2), 38-45.
- Lazaruk, W. (2007). Linguistic, academic, and cognitive benefits of French immersion. *Canadian Modern Language Review*, 63(5), 605-627.10.3138/cmlr.63.5.605.
- Lee, H., & Kim, K. (2011). Can Speaking More Languages Enhance Your Creativity? Relationship Between Bilingualism and Creative Potential Among Korean American Students with Multicultural Link. *Personality and Individual Differences*, 50(8), 1186–1190.
- Leikin, M. (2012). The effect of bilingualism on creativity: Developmental and educational perspectives. *International Journal of Bilingualism*,17(4),431-447. Doi:10.1177/1367006912438300.
- Lehtonen, B., Tuuala, M., Karjalainen, D., & Sinikka, A. (2008). University Graduates' Workplace Language Needs as Perceived by Employers. *System.* 36. 492–503.
- Liberman, Z., Woodward, A., Keysar, B., & Kinzler, K. (2016). Exposure to multiple languages enhance communication skills in infancy. *Developmental Science*. 20. N/a-n/a. 10.1111/desc.12420.
- Linda, D., Lisa, F., Channa C., Barron B., & Osher D. (2020). Implications for Educational Practice of The Science of Learning and Development. *Applied Developmental Science*, 24(2), 97-140.

- Logan, G. (1988). Toward an Instance Theory of Automatization. *Psychological Review*, 95(4), 492–527.
- Macwhinney, B. (2010). A Bilingual Advantage in Task Switching. *Bilingualism:* Language and Cognition, 13, 253 – 262.
- Macwhinney, B., Fromm, D., Forbes, M., & Holland, A. (2011). Aphasiabank: Methods For Studying Discourse. *Aphasiology*, 25. 1286-1307.
- Macdonald, P. (2011). Maturation. In: Goldstein S., Naglieri J. (Eds.) Encyclopedia Of Child Behavior and Development. Boston: Springer.
- Macnamara, J. (2010). The Bilingual's Linguistic Performance—A Psychological Overview. *Journal of Social Issues*, 23, 58 - 77.
- Maniscalco, B., & Lau, H. (2014). Signal detection theory analysis of type 1 and type 2 data: meta-d', response-specific meta-d', and the unequal variance SDT mode.
  In S. M. Fleming & C. D. Frith (Eds.), *The Cognitive Neuroscience of Metacognition* (pp.25-66). Springer.
- Madrid, D. (2000). *Learning Strategies, Teaching English as A Foreign Language*, Barcelona: The Australian Institute.
- Madrinand S. (2014). The Use of First Language in Second Language Classroom: A Support for Second Language Acquisition. *Gist Research and Learning Research Journal*,9, 50-66.
- Marinova-Todd, S. H. (2012). "Corplum is a core from a plum": The advantage of bilingual children in the analysis of word meaning from verbal context. *Bilingualism*, 15(1), 117.
- Marian, V., & Kaushanskaya, M., (2000). Self-Construal and Emotion in Bicultural Bilinguals. *Journal of Memory and Language*, 51. 190-201.
- Markman, E., & Yow, W. (2011) 'Young Bilingual Children's Heightened Sensitivity to Referential Cues', *Journal of Cognition and Development*, *12*(1), 12 31.
- Malarz. L. (1991). School Based Management: What Bilingual and ESL Program Directors Should Know. Washington, D.C.
- Mason, J. (2018). *Qualitative Researching*. (Third ed.) California: Sage Publications Ltd.

- Mcleod, S. (2020). Maslow's Hierarchy of Needs. Simply Psychology, 13, 24-33.
- Melitz, J. (2002). Language and Foreign Trade. *European Economic Review*, 52, 667-699.
- Miller, P. (1993). *Theories of Developmental Psychology*. New York: W.H. Freeman And Company.
- Mishra, S., Templeton, A., & Meadows, T. (2017). Living, Fast and Slow: Is Life History Orientation Associated with Risk-Related Personality Traits, Risk Attitudes, Criminal Outcomes, And Gambling? *Personality and Individual Differences*, 117, 242-248. Doi: 10.1016/J.Paid.2017.06.009.
- Morales, J., Calvo, A., & Bialystok, E. (2013). Working Memory Development in Single Language, Monolingual and Bilingual Children. *Journal of Experimental Child Psychology*, 114(2), 187–202.
- Moreno S, Wodniecka Z, Tays W, Alain C, & Bialystok E. (2014). Inhibitory Control In Bilinguals and Musicians: Event Related Potential (Erp) Evidence for Experience-Specific Effects. *Plos One*, 9(4), Rome Moreno Publisher.
- Mower, E. (2018). The Successful Foreign Language Classroom: Affect, Empathy, and Engagement. *An all planned Graduate Plan B and other plan Reports*.1199. https://digitalcommons.usu.edu/gradreports/1199.
- Murphy, V., Macaro, E., Alba, S., & Cipolla, C. (2014). The influence of learning a second language in primary school on developing first language literacy skills. Applied *Psycholinguistics*, 36, 1-21. 10.1017/S0142716414000095.
- Myer D. (2008). Social Psychology. New York: mcgraw-Hill.
- Myles, J. (2002). Second Language Writing and Research: The Writing Process and Error Analysis in Student Texts. *TESL-EJ*, 6(2), 155-171.
- National Standards in Foreign Language Education Project. (1996). *Standards for foreign language learning in the 21st century*. Lawrence, KS: Allen Press.
- Newell, K. (1986). Constraints on the Development of Coordination. In M. Wade & H.T.A.Whiting (Eds.), Motor Development in Children: Aspects of Coordination and Control (pp. 341-360). Dordrecht, Netherlands: Martinus Nijhoff.

- Newton, N., Champion, K., Slade, T., Chapman, C., Stapinski, L., Koning, I., Tonks, Z., & Teesson, M. (2017). A Systematic Review of Combined Student- And Parent-Based Programs to Prevent Alcohol and Other Drug Use Among Adolescents. *Drug Alcohol Review*, 36, 337-351.
- Nezet N., Lee D., William G., & White, C. (2015). *Ib Philosophy Being Human Course Book: Oxford Ib Diploma Programme*. Oxford: Oxford University Press.
- Nicoladis, G., & Fred, E. (2008). Bilingual First Language Acquisition. *Blackwell Handbook of Language Development*, *16*, 324 – 342. Doi: 10.1002/9780470757833.
- Nicoladis, E., Hui, D., Wiebe, S. (2018). Language Dominance and Cognitive Flexibility in French–English Bilingual Children. Frontiers in Psychology, 9, 10.3389/fpsyg.2018.01697.
- Norton, M., Monin, B., Cooper, J., & Hogg, M. (2003). Vicarious Dissonance: Attitude Change from the Inconsistency of Others. *Journal of personality and social psychology*, 85, 47-62. 10.1037/0022-3514.85.1.47.
- Nowak, W. (2014). Employees Attitudes towards Organisational Change: An Explanatory Model Proposal. *Kultura i Edukacja*, 106, 89-104.
- Nurul, A. (2015). The Relationship Between Language Learning Strategies and Students' Motivation in Learning English as a Second Language, Jurnal: Sains Press.
- Nutting, P., Beasley, J., Werner, J. (1999). Practice-based research networks to answer primary care questions. *Journal of the American Medical Association*, 281, 686– 688.
- Oliveri, E., Lawless, R., Robin, F., & Bridgeman, B. (2018). An Exploratory Analysis Of Differential Item Functioning and Its Possible Sources in A Higher Education Admissions Context. *Applied Measurement in Education*, 31, 1–16.
- Oxfam, G. (2006), Education for Global Citizenship: A Guide for Schools. Retrieve from http://Www.Oxfam.Org.Uk/~/Media/Files/Education/Global%20 citizenship/Education\_For\_Global\_Citizenship\_A\_Guide\_For\_Schools.Ashx

- Oxford, R., (1990). *Language Learning Strategies: What Every Teacher Should Know*. Boston: Heinle & Heinle.
- Oxford, R.L. (2001). Language Learning Styles and Strategies. In M. Celce-Murcia (Ed.), *Teaching English as a Second Language* (pp. 359-366). Boston: Heinle & Heinle.
- Oxford, RL. (2003). Toward A More Systematic Model of Second Language Learner Autonomy. In D. Palfreyman & R. Smith (Eds.), *Learner Autonomy Across Cultures*. London: Palgrave Macmillan.
- Paap, K., Myuz, H., & Sawi, O. (2014). Are bilingual advantages dependent upon specific tasks or specific bilingual experiences? *Journal of Cognitive Psychology*, 26, 10.1080/20445911.2014.944914.
- Pablo, B., & Petty, R. (2006). *The Elaboration Likelihood Model*. Houston: Iyk Press. 10.4135/9781446249215.n12.
- Palmeri, T. J. (1997). Exemplar similarity and the development of automaticity. Journal of Experimental Psychology: Learning, Memory, and Cognition, 23(2), 324–354. Https://doi.org/10.1037/0278-7393.23.2.324
- Palinkas, L. (2014). Qualitative and Mixed Methods in Mental Health Services and Implementation Research. *Journal of Clinical Child & Adolescent Psychology*, 43, 10.1080/15374416.2014.910791.
- Parahoo, K. (2006). Nursing Research: Principles, Process and Issues. (2nd Ed.). Hampshire: Palgrave Macmillan, 36-37.
- Paton G. (2008). University Students Cannot Spell. Daily Telegraph, 6. 35-41.
- Perloff, R. (2017). Communication and Attitudes in the 21st Century. *The Dynamics Of Persuasion, 10,* 24-28.
- Peterson J, Marinova-Todd S. & Mirenda, P. (2012) Brief Report: An Exploratory Study of Lexical Skills in Bilingual Children with Autism Spectrum Disorder. *Journal of Autism and Developmental Disorders*, 42(7),1499–1503. Doi: 10.1007/S10803-011-1366-Y.
- Peterson, E. (2004). *Center for Applied Linguistics*. ESL magazine. Chicago: Modern English Publishing. Pp. 18–22.

- Peterson, E. & Bronwyn, C. (2003). Culture in Second Language Teaching. In *Culture in Second Language Teaching* (Vol. EDO-FL-03-09). (ERIC Clearing House on Languages and Linguistics). Center for Applied Linguistics.
- Peterson, M. (2013). *Computer games and language learning*. New York: Palgrave Macmillan.
- Preedy V. & Watson RR. (eds). (2010). Handbook of Disease Burdens and Quality of Life Measures. Springer, New York: NY. Https://doi.org/10.1007/978-0-387-78665-0 6363.
- Pishghadam, R. (2009). Emotion-Based Language Instruction (EBLI) as a new perspective in bilingual education. *Multilibgual Education*, 3, 10.1186/2191-5059-3-9.
- Ratte, E. (1968). Foreign Language and the Elementary School Language Arts Program. *The French Review*, 42(1).
- Reysen, S. & Katzarska-Miller, I. (2013), Intentional Worlds and Global
  Citizenship, Journal Of Global Citizenship & Equity In Education, 3(1),
  Retrieve from Journals.Sfu.Ca/Jgcee.
- Reynolds, W. (2013). History of Colonization in The Middle East and North Africa (Mena): Precursor to Cold War Conflict, Coldwarstudies.Com, Retrieve from http://Www.Coldwarstudies.Com/2013/01/11/History-Of-Colonization-In-The-Middle-East-And-North-Africa-Mena-Precursor-To-Cold-War-Conflict/
- Robin, N. (2001) Disorganization in mice and humans. Am. J. Med. Genet, 101(4), 334-8.
- Rogde K., Melby-Lervåg M., & Lervåg A. (2016) Improving the General Language
  Skills of Second-Language Learners in Kindergarten: A Randomized Controlled
  Trial. *Journal of Research on Educational Effectiveness*, 9(1), 150-170, DOI: 10.1080/19345747.2016.1171935.
- Roberton, M. (1993). New Ways to Think About Old Questions. In Thelen, E. And Smith L. B. (Eds.), *A Dynamic Systems Approach to Development: Applications*. (Pp. 95–118). Cambridge, Ma: Mit Press.

- Riordan, B. (2005). Language Policy for Linguistic Minority Students in Japanese Public Schools and Prospects for Bilingualism: The Nikkei Brazilian Case. 45.
- Rudman, L. (2004). Sources of Implicit Attitudes. Current Directions in Psychological Science, 13(2), 79-82. Doi:10.1111/j.0963-7214.
- Sato, M. (2018). Interaction and Instructed Second Language Acquisition. Language Teaching, 51, 285-329. Doi:10.1017/S0261444818000125.
- Scarcella, R. (1992). The Tapestry of Language Learning: The Individual in The Communicative Classroom. Boston: Heinle & Heinle.
- Schattle, H., (2007). *The Practices of Global Citizenship*, Lanham: Rowman and Littlefield Publishers.
- Schattle, H. (2009). Global Citizenship in Theory and Practice. In the Handbook of Practice and Research in Study Abroad: Higher Education and the Quest for Global Citizenship, ed. R. Lewin. New York: Routledge.
- Schissel, H., Jamie L., & López-Gopar, M. (2018). Grappling with Trans-Languaging For Teaching and Assessment In Culturally And Linguistically Diverse Contexts: Teacher Perspectives From Oaxaca, Mexico. *International Journal Of Bilingual Education*. Doi: 10.1080/13670050.2018.1463965.
- Schrauf, R. (2006). Bilingual Autobiographical Memory and Emotion: Theory And Methods. In Pavlenko (Ed.), Pp. 284–311.
- Semaan, G., & Yamazaki, K. (2015). The relationship between global competence and language learning motivation: an empirical study in critical language classrooms. *Foreign Lang. Ann.* 48, 511–520. Doi: 10.1111/flan.12146
- Seidhofer, B. (2005), English As A Lingua Franca, *Oxford Journals*, Retrieve from http://Eltj.Oxfordjournals.Org/Content/59/4/339.Full.Pdf+Html
- Siddman, M. (1994). Equivalence relations and behavior: an introductory tutorial. *The Analysis of verbal behavior*, *25*(1), 5–17. Https://doi.org/10.1007/BF03393066
- Siegel, LS, (2003). The Development of Reading in Children Who Speak English as A Second Language. *Developmental Psychology*, *39*(6), 1005–1019.

- Siegal, M., Frank, C., Surian, L., & Hjelmquist, E. (2011). Theory of Mind and Bilingual Cognition. *Language and Bilingual Cognition*, 431-452.
- Speelman, C. (2005). Skill Acquisition: History, Questions, And Theories in Speelman, C. & Kirsner, K. *Beyond the Learning Curve*, Oxford: Oxford University Press.
- Sroufe, L., Cooper, G., & Dehart, B. (1996). Child Development: Its Nature and Course (3rd Ed.). New York: Knopf.
- Shields, R. (2013). Globalization and International Education: Contemporary Issues In Education Studies. London, U. K.: Bloomsbury Publishing.
- Smith, M. (2002). Jerome S. Burner and The Process of Education. *The Encyclopedia of Informal Education*. UK: infed.org.
- Smith, E., Geva, A., Jonides, J., Miller, A., Reuter-Lorenz, P., & Koeppe, R. (2001). The neural basis of task-switching in working memory: Effects of performance and aging. *Proceedings of the National Academy of Sciences of the United States* of America. 98. 2095-100. 10.1073/pnas.98.4.2095.
- Soveri, A., Rodriguez-Fornells, A., & Laine, M. (2011). Is There A Relationship Between Language Switching and Executive Functions in Bilingualism? Introducing A Within Group Analysis Approach. Frontiers in Psychology, 2, 183.
- Stahl, GK., Chua, CH. & Pablo, A. (2012). Does national context affect target firm employees' trust in acquisitions? A policy-capturing study. *Management International Review*, 52, 395-423. 10.2307/41494978.
- Stein- Smith, M. (2019) The Process of Education. The Encyclopedia of Informal Education. UK: infed.org.
- Stussi, Y., Pourtois, G., Olsson, A., & Sander, D. (2020). Learning biases to angry and happy faces during Pavlovian aversive conditioning. Emotion. 10.1037/emo0000733.
- Stussi, Y., Ferrero, A. & Pourtois, G. (2019) Achievement motivation modulates Pavlovian aversive conditioning to goal-relevant stimuli. *Npj Sci. Learn*, 4, 4. Https://doi.org/10.1038/s41539-019-0043-3.

- Sullivan, R., Gunnar, M., Hostinar, E., Sanchez, M. & Tottenham, N. (2015). Parental Buffering of Fear and Stress Neurobiology: Reviewing Parallels Across Rodent, Monkey, And Human Models. *Social Neuroscience*, 10(5), 474–478.
- Sung, CM, (2016). ESL university students' perceptions of their global identities in English as a lingua franca communication: a case study at an international university in Hong Kong. *Asia Pac. Educ. Res,* 25, 305–314. Doi: 10.1007/s40299-015-0263-0
- Swygart-Hobaugh, A. J. (2004). A citation analysis of the quantitative/qualitative methods debate's reflection in sociology research: Implications for library collection development. *Library Collections, Acquisitions, and Technical Services*, 28(2), 180-195.
- Taatgen, N. (2002). Production Compilation: A Simple Mechanism to Model Complex Skill Acquisition, *Human Factors*, 45(1), 61-76.
- Thelen, E. (2000). Motor Development as Foundation and Future of Developmental Psychology. *International Journal of Behavioral Development, 24*, 385–397.
- Turner, RC., & Carlson, L. (2003). Indexes of Item-Objective Congruence For Multidimensional Items. *International Journal of Testing*, 3(2), 163-171. Https://Doi.Org/10.1207/s15327574ijt0302\_5.
- UNESCO. (2014). Global citizenship education: preparing learners for the challenges of the 21st century. Collation:44. Retrieve form https://en.unesco.org/news/ global-citizenship-education-preparing-learners-challenges-twenty-first-century-
- Valoes, L. (2020). Importance of Language Why Learning A Second Language Is Important. Michigan: Trinity Press.
- Vanpatten, B., & Benati, G. (2010). *Key Terms in Second Language Acquisition*. London: Continuum.
- Veenstra, L., Schneider, I., Bushman, B., & Koole, S. (2016). Drawn to Danger: Trait Anger Predicts Automatic Approach Behaviour To Angry Faces. Cognition & Emotion. 31. 1-7.

Vega, Diego. (2014). Effects of An Elementary Two Way Bilingual Spanish-English Immersion School Program on Junior High and High School Student Achievement. *Middle Grades Research Journal*, 1, 27-47.

Venon L. (Ed.). (1976). Children as Teachers. New York. Academic Press.

- Vernon, J. (1976). Effects of Childhood Bilingualism. *Elementary English*, 39, 132–143.
- Walker, G., (2002). The Language of International Education. In: Hayden, Thompson,Walker, Eds. International Education in Practice: Dimensions for National andInternational Schools. London And New York: Routledge Pp. 208-216.
- Wells, J. (2011). International Education, Values and Attitudes: A Critical Analysis of the International Baccalaureate (Ib) Learner Profile. *Journal of Research in International Education*, 10, 174-188.
- White, C. (1993). Strategy Used in Second Language Learning: A Comparative Study.(Unpublished Doctoral Dissertation). Massy University, Palmerston, New Zealand.
- White, C. (2008). Language learning strategies in independent language learning: An overview. In T. W. Lewis & M. S. Hurd (Eds.), *Language learning strategies in independent settings*. Clevedon, England: Multilingual Matters. Pp. 3-24.
- Wilson, T., Lindsey, S., & Schooler, T. (2000). A Model of Dual Attitudes. *Psychological review*, 107. 101-26. 10.1037//0033-295X.107.1.101.
- Wodniecka, Z. (2010). Does bilingualism help Memory? Competing effects of verbal ability and executive control. *International Journal of Bilingual Education and Bilingualism*, 13, 575–595. Doi:10.1080/13670050.2010.488287
- Yow, W. & Markman, Ellen. (2011). Bilingualism and children's use of paralinguistic cues to interpret emotion in speech. *Bilingualism: Language and Cognition*, 14, 562 - 569. 10.1017/S1366728910000404
- Zofia, W., Fergus, M., Craik, L., Bialystok E. (2010). Does Bilingualism Help Memory? Competing Effects Of Verbal Ability And Executive Control, International Journal Of Bilingual Education and Bilingualism, 13(5),575-595.

# APPENDICES



# APPENDIX A

## **CONSENT LETTER**





Consent Form.

Date: 29th May, 2020.

The Principal, Satit Bilingual School of Rangsit University, Secondary School, Pathum Thani.

I am Unyime Francis ID:6106025, a master's degree student in Suryadhep Teachers College of Rangsit University. As part of my course, I am undertaking a research entitled: The Impacts of Second language Learning on Bilingual Students' Attitudes and Professional Skills for Global Citizenship. The objectives of this study are to investigate:

to what extent students of a bilingual education program have acquired attitudes and professional skills for global citizenship through the learning of a second language at a bilingual education provider in Thailand.

Prior to undertaking the study, I require approval to approach seventh to twelfth grade students who have been in a bilingual program for six years or more to take part in the questionnaire which is scheduled to take place during June and August 2020 through an online platform. I can assure you that data collected will be kept confidential. Your assistance is highly appreciated.

My research is supervised by Asst. Prof. Dr. Noparat Tananuraksakul, lecturer, MA Program in Bilingual Education, Faculty of Education, Rangsit University, Thailand.

For any further concerns or inquiry, please do not hesitate to contact me at Ubassey88@gmail.com or 0989418183 or contact my supervisor at noparat.t@rsu.ac.th.

Yours sincerely,

Unyime Francis (Student)

Asst. Prof. Dr. Noparat Tananuraksakul (Supervisor)

J-15013 n

Assoc.Prof.Dr. Usaporn Swekwi (Dean )

# APPENDIX B

IOC



#### The Item Objective Congruence Index (IOC) Form

Part 1: The Impacts of Second language Learning on Bilingual Students' Attitudes and Professional Skills for Global Citizenship

**Objectives:** To investigate to what extent students of a bilingual education program have acquired attitudes and professional skills for global citizenship through the learning of a second language at a bilingual education provider in Thailand; and

 $\mathbf{6}$ 

#### Background Information

Please tick the correct option

1. Gender 🗆 Male	🗆 Female					
2. Age 0.7-1	1 🗆 12-1	5 016-20	Above 20			
3. Nationality						
🗆 Thai	🗆 Chinese					
□ Others (Please specify			)			
4. Grade Level						
07 08	09	□ 10 □ 11.	D 12			
6. Your first language						
🗆 English	🗆 Thai	🗆 Chinese	S			
□ Others (Please specify)						
7. Your most spoken langua	age					
🗆 English	🗆 Thai	🗆 Chinese				
□ Others (Please specify.)						
8. Length of your study in the Bilingual Programme						
🗆 б years	□ 7 years	□ 8years	□ 9years			
🗆 10 years	🗆 11 years	🗆 12 years				

(If you have not studied in a bilingual programme for at least 6 years, please do not continue with part 2).

#### PART 2: ATTITUDE AND PROFESSIONAL SKILLS FOR GLOBAL CITIZENSHIP

**Direction:** Please tick the option that corresponds to your opinion towards content validity. Rate +1, If the item clearly matches the stated objectives. Rate 0, If the item is uncler or unsure whether the measure meet the stated objectives. Rate -1, If the item does not match the stated objectives.

#### Please see the definition of key terms in my research proposal on page ...



What to be measured	t to be measured Item Statements		Score content	
Attitude for Global		vali	any	
Citizenship		+1	0	-]
Empathy	7. Second language learning in a bilingual setting		1	
	has made me imaginatively project myself into			
	another's situation, becoming open minded and			
	reflective about their perspective, in order to			
	understand their			
	a. thoughts			
	b. reasoning			
	c. emotions			
Enthusiasm	8. Second language learning in a bilingual setting			
	has made me			
	a. enjoy learning			
	b. willing to put effort into my learning process			
Independence				Γ
	9. Second language learning in a bilingual setting			
	has made me			
	a. think independently			
	b. act independently			
	c. make my own judgements based on reasoned			
	principles			
	d. able to defend my judgements			
Integrity	10. Second language learning in a bilingual			Γ
	setting has made me develop a firm sense of			
	a. fairness			
	b. honesty			
Respect	11. Second language learning in a bilingual			Γ
	setting has made me respect	5		
2	a. myself			
To a	b. others			
4	c. the world around me			
Tolerance	12. Second language learning in a bilingual			Γ
2 m	setting has made me feel			
18/20	a. sensitive towards differences and diversity in the			
" <sup>ท</sup> ยาลัย	world			
210	b. responsive to the needs of others			

	d. comprehending from a variety of sources for	
	information and pleasure	
	e. concluding from a variety of sources for	
	information and pleasure	
	f. writing and recording information	
	g. observing visuals and multimedia	
	h. viewing visuals and multimedia	
	i. interpreting visuals and multimedia	
	j. analyzing visuals and multimedia	
	k. engaging and understanding non-verbal	
	communication	
Self-management Skills	4. Second language learning in a bilingual setting	
	has helped me in	
	a planning activities	
	b. carrying out activities effectively	
	c. time management	
Thinking Skills	5. Second language learning in a bilingual setting	
	has helped me in	
	a. knowledge acquisition	
	b. gaining specific facts and ideas	
	c. grasping meaning from materials learned	
	d. communicating	
	e. interpreting learning	
	f. making applications	
	g. synthesizing	
	h. evaluating	
	i. remembering vocabulary from facts and ideas	
	learned.	

Additional Comment

Suggestions

## APPENDIX C

## LETTER OF EVALUATION OF RESEARCH INSTRUMENTS





Subject: Letter of Invitation Dear Asst. Prof. Dr. Ratchaporn Rattanaphumma

Enclosure: 1. Research proposal 2. Questionnaire 3. Evaluation form (IOC checklist)

On behalf of Suryadhep Teachers College, Rangsit University, I am writing to request your expertise to evaluate the instrument that will be used by Unyime Francis Bassey, an M.Ed student in Graduate Program of Bilingual Education. He is currently doing his research entitled "The impact of second language learning on bilingual learner's attitudes and professional skills for global citizenship" As part of the study, experts will need to validate (content validity) the instrument. There is an evaluation form (ioc checklist) enclosed with the research proposal for the evaluate to access and provide comments. evaluator to assess and provide comments.

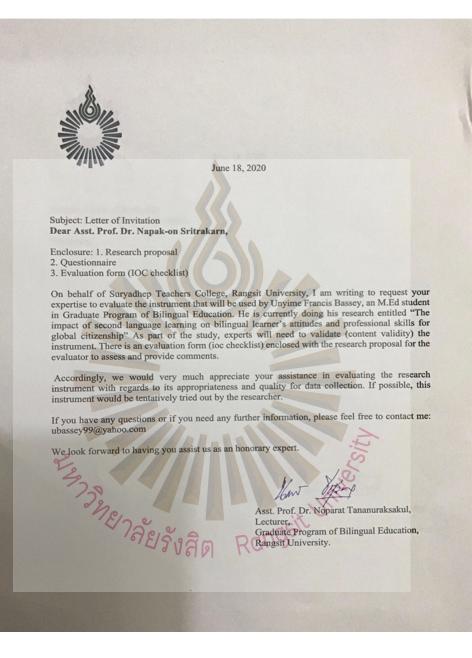
Accordingly, we would very much appreciate your assistance in evaluating the research instrument with regards to its appropriateness and quality for data collection. If possible, this instrument would be tentatively tried out by the researcher.

If you have any questions or if you need any further information, please feel free to contact me: ubassey99@yahoo.com

We look forward to having you assist us as an honorary expert.

Asst. Prof. Dr. Noparat Tananuraksakul, Carduate Program of Bilingual Education, Rangsit University.

Hom





June 18, 2020

Subject: Letter of Invitation Dear Dr. Suthida Soontornwipat,

Enclosure: 1. Research proposal 2. Questionnaire

3. Evaluation form (IOC checklist)

On behalf of Suryadhep Teachers College, Rangsit University, I am writing to request your expertise to evaluate the instrument that will be used by Unyime Francis Bassey, an M.Ed student in Graduate Program of Bilingual Education. He is currently doing his research entitled "The impact of second language learning on bilingual learner's attitudes and professional skills for global citizenship" As part of the study, experts will need to validate (content validity) the instrument. There is an evaluation form (ice checklist) enclosed with the research proposal for the evaluator to assess and provide comments.

Accordingly, we would very much appreciate your assistance in evaluating the research instrument with regards to its appropriateness and quality for data collection. If possible, this instrument would be tentatively tried out by the researcher.

If you have any questions or if you need any further information, please feel free to contact me: ubassey99@yahoo.com

We look forward to having you assist us as an honorary expert.

Asst. Prof. Dr. Noparat Tananuraksakul, Lecturer, Graduate Program of Bilingual Education Rangsit University.

## APPENDIX D

# QUESTIONNAIRE



#### Questionnaire

This questionnaire is part of a research study entitled "The Impacts of Second Language Learning on Bilingual Students' Attitudes and Professional Skills for Global Citizenship". It aims to investigate to what extent second language learning helps learners in the acquisition of attitudes and professional skills for global citizenship. It is made up of two parts: participants' demography and items measuring attitudes and professional skills for global citizenship.

This questionnaire is not a test or examination and is not connected to your academic achievement or grading. Your identity and responses in this questionnaire will be voluntary and kept unidentified. The discovery derived would go a long way to meet the objectives of this study, and your contribution will be greatly appreciated.

#### PART 1: PERSONAL INFORMATION

1. Gender 🗆 🛙	Male	- Female		
2. Age □ 7-11	□ 12-1:	5 🗆 16-20 🗆 Abov	e 20	
3. Nationality	Thai 🗆 Chin	ese 🗆 Others	(Please specify	)
4. Grade Level				
□ 7	□ 8	□ 9	□ 10 □ 11.	□ 12
6. Your first langu	age			
English		🗆 Thai	Chinese	
□ Others (Please sp	ecify)			)
7. Your most spoke	en language			
English	ME/2	🗆 Thai	Chinese	
□ Others (Please sp	ecify	<i>ายร</i> ังสิด	.Raudz,	
8. Length of your s	study in the I	Bilingual Program	nme	
$\square$ 6 years	I	□ 7 years	□ 8years	□ 9years
$\square$ 10 years		□ 11years	$\square$ 12 years	
(If you have not st	udied in a bi	lingual programr	ne for at least 6 years, p	please do not continue with

part 2)

## PART 2: ATTITUDE AND PROFESSIONAL SKILLS FOR GLOBAL CITIZENSHIP

Direction: Please mark  $\sqrt{}$  in the column that shows the number representing your honest opinion on each item.

(5=Strongly agree 4=Agree 3 = neutral 2=Disagree 1=Strongly disagree)

## Attitude for Global Citizenship

Attitude for Global Citizenship					
Items	1	2	3	4	5
1. Second language learning in a bilingual setting has made me					
appreciate					
A. The wonder and beauty of the world					
B. People from culturally diverse backgrounds					
2. Second language learning in a bilingual setting has made me					
committed to					
A. Learning					
B. Persevering					
C. Showing self-discipline	t.				
D. Responsibility	Grs/				
3 .Second language learning in a bilingual setting has made me					
courageous to					
A. Take risks					
B. Apply what I have learned in making appropriate decisions and					
choices					

Attitude for Global Citizenship

Items	1	2	3	4	5
4. Second language learning in a bilingual setting has made me					
A. Cooperate with others					
B. Collaborate with others					
C. Lead in a given circumstance					
D. Follow as the situation demands					
5. Second language learning in a bilingual setting has made me					
creative and imaginative in					
A. My thinking.					
B. My approach to problems and dilemmas					
6. Second language learning in a bilingual setting has made me					
curious about	ity				
A. The nature of learning	Siz				
B. The world					
B. The world C. People of the world					
D. Cultures of the world					

Attitude for Global Citizenship

Items	1	2	3	4	5
7. Second language learning in a bilingual setting has made me					
imaginatively project myself into another's situation, becoming					
open minded and reflective about their perspective, in order to					
understand their					
A. Thoughts					
B. Reasoning					
C. Emotions					
8. Second language learning in a bilingual setting has made me					
A. Enjoy learning					
B. Willing to put effort into my learning process					
9. Second language learning in a bilingual setting has made me	ty				
A. Think independently	5				
B. Act independently					
C. Make my own judgements based on reasoned principles					
D. Able to defend my judgements					
		1			

Attitude for Global Citizenship

Items	1	2	3	4	5
10. Second language learning in a bilingual setting has made me					
develop a firm sense of					
A. Integrity					
B. Fairness					
C. Honesty					
11. Second language learning in a bilingual setting has made me					
respect					
A. Myself					
B. Others					
C. The world around me					
12. Second language learning in a bilingual setting has made me feel					
A. Sensitive towards differences and diversity in the world					
B. Responsive to the needs of others					
La Sherra Elsvan Rangsit					

Professional Skills for Global Citizenship

Items	1	2	3	4	5
1. Second language learning in a bilingual setting has helped					
me in					
A. Formulating questions					
B. Observations					
C. Collecting data					
D. Recording data					
E. Planning					
F. Data organization					
G. Interpretation of data					
and the second sec		1/0			
H. Presentation of results	S				
2. Second language learning in a bilingual setting has helped	50				
me in A. Respecting others					
A. Respecting others					
D. Comparing					
B. Cooperating					
C. Desching anglist					
C. Resolving conflict					
D. Group decision making					
D. Group decision making					
E. Adopting a variety of group roles					
D. Adopting a variety of group foles					

Professional Skills for Global Citizenship

Items	1	2	3	4	5
3. Second language learning in a bilingual setting has helped					
me in					
A. Listening to information					
B. Speaking clearly and logically					
C. Reading from a variety of sources for information and pleasure					
D. Comprehending from a variety of sources for information and pleasure					
E. Concluding from a variety of sources for information and					
pleasure     F. Writing and recording information					
G. Observing visuals and multimedia	1.01	12/0.			
H. Viewing visuals and multimedia	UNIN				
I. Interpreting visuals and multimedia Rangsit					
J. Analyzing visuals and multimedia					
K. Engaging and understanding non-verbal communication					

Professional Skills for Global Citizenship

Items	1	2	3	4	5
4. Second language learning in a bilingual setting has helped					
me in					
A. Planning activities					
B. Carrying out activities effectively					
C. Time management					
5. Second language learning in a bilingual setting has helped					
me in					
A. Knowledge acquisition					
B. Gaining specific facts an					
D ideas					
C. Grasping meaning from materials learned					
D. Communicating	Sit.	-			
E. Interpreting learning	, in the				
F. Making applications	0.				
G. Synthesizing Rouge Rouge					
H. Evaluating					
I. Remembering vocabulary from facts and ideas learned					

THANK YOU FOR YOUR COOPERATION.

# APPENDIX E

# SEMI STRUCTURED INTERVIEW



#### SEMI STRUCTURED INTERVIEW QUESTIONS

- 1. How has studying in a bilingual setting made you appreciate the beauty of the world and its diverse people?
- 2. In what way has studying in a bilingual setting made you committed to your learning and other aspects of your life?
- 3. How has studying in a bilingual setting made you courageous and confident?
- 4. How has studying in a bilingual setting made you cooperate and collaborate effectively with others?
- 5. In what ways has studying in a bilingual setting made you creative?
- 6. In what ways has studying in a bilingual setting developed curiosity in you?
- 7. How has studying in a bilingual setting made you empathetic towards others?
- 8. In what ways has studying in a bilingual setting made you enjoy learning and enthusiastic about it?
- 9. In what ways has studying in a bilingual setting made you independent?
- 10. How has studying in a bilingual setting made you honest?
- 11. How has studying in a bilingual setting made you respectful?
- 12. How has studying in a bilingual setting made you tolerate others?
- 13. How has studying in a bilingual setting developed your research skills?
- 14. How has studying in a bilingual setting developed your social skills?
- 15. How has studying in a bilingual setting developed your communication skills?
- 16. How has studying in a bilingual setting developed your thinking skills?
- 17. How has studying in a bilingual setting developed your self-management skills?

# **Biography**

Name Unyime Francis Bassey Date of birth 02 July1991 Place of birth Anua/Uyo, Nigeria Education background Pontifical Urban University, Rome Bachelors of Philosophy, 2014. Imo State University, Owerri, Nigeria Bachelors of Arts, (Philosophy), 2014. Rangsit University, Thailand Masters of Education in Biligual Educational, 2020. ubassey88@gmail.com Satit Bilingual School of Rangsit University, Amphor-Muang Pathumthani, 12000, Thailand ระสาวจิทยาลัยรังสิต Homeroom Teacher ngsit Unit

Rai

Email Address Place of work

Work position