THE EFFECT OF CLIL-BASED TRAINING ON TURKISH EFL PRE-SERVICE TEACHERS' SELF-EFFICACY BELIEFS AND ATTITUDES TOWARDS CLIL

Guzyal KASSYMOVA

THE EFFECT OF CLIL-BASED TRAINING ON TURKISH EFL PRE-SERVICE TEACHERS' SELF-EFFICACY BELIEFS AND ATTITUDES TOWARDS CLIL

A THESIS SUBMITTED TO THE GRADUATE SCHOOL OF EDUCATIONAL SCIENCES OF BAHÇEŞEHİR UNIVERSITY

BY

Guzyal KASSYMOVA

IN PARTIAL FULFILLMENT OF THE REQUIREMENTS FOR THE DEGREE OF MASTER OF ARTS IN THE DEPARTMENT OF ENGLISH LANGUAGE TEACHING

Approval of the Graduate School of Educa	ational Sciences
·	\ \ \ \ \ \ \ \ \ \ \ \ \ \ \ \ \ \ \
	Assist. Prof. Dr. Enisa MEDE
	Director
I certify that this thesis satisfies all the req	uirements as a thesis for the degree of
Master of Arts.	
	Mour
	Assist. Prof. Hatime ÇİFTÇİ
	Coordinator
	8
This is to certify that we have read this th	nesis and in our opinion it is fully adequate,
in scope and quality, as a thesis for the de	
	Main
e e	Assist. Prof. Hatime ÇİFTÇİ
*	Supervisor
	Supervisor
Examining Committee Members	ai ai
	[]
Assist. Prof. Hatime ÇİFTÇİ	(BAU, ELT) Mour
Assist. Prof. Mustafa POLAT	(BAU, ELT) Ul pur
Assist. Prof. Tuncer CAN	(IU, ELT)

I hereby declare that all information in this document has been obtained and presented in accordance with academic rules and ethical conduct. I also declare that, as required by these rules and conduct, I have fully cited and referenced all material and results that are not original to this work.

Name, Last Name: Guzyal Kassymova Signature : X

Signature

ABSTRACT

THE EFFECT OF CLIL-BASED TRAINING ON TURKISH EFL PRE-SERVICE TEACHERS' SELF-EFFICACY BELIEFS AND ATTITUDES TOWARDS CLIL

Kassymova, Guzyal

Master's Thesis, Master's Program in English Language Education Supervisor: Assist. Prof. Hatime ÇİFTÇİ

June 2018, 85 pages

This thesis aims to investigate the effect of CLIL teacher training on Turkish EFL pre-service teachers' self-efficacy beliefs and attitudes towards CLIL as well as their reflections of CLIL understanding in planning lessons. For this purpose, a group of 28 Turkish ELT students was trained on CLIL, its theoretical background, aims, principles, strategies for planning, and teaching lessons. The data collection tools included Teacher Self-Efficacy Scale, Attitudes and Experiences in CLIL questionnaire, semi-structured interviews, and lesson plans. The students completed pre-test and post-test of Teacher Self-Efficacy Scale in order to measure the effect of training on their self-efficacy beliefs. Moreover, the students' attitudes towards CLIL were explored through the attitudes questionnaire and semi-structured face-to-face interviews. Finally, CLIL-based lesson plans presented by the trainees in the final training session were described and analyzed in order to find out the participants' reflections of CLIL understanding in their lesson plans. The findings of the present study revealed that the introductory CLIL-based teacher training had a statistically significant effect on the Turkish EFL pre-service teachers' self-efficacy beliefs. Their attitudes towards CLIL turned out to be positive. Finally, the participants reflected their clear understanding of CLIL and its 4 Cs framework in planning lessons.

Keywords: CLIL, Teacher Self-Efficacy Beliefs, Teacher Training

CLIL-TABANLI EĞİTİMİN TÜRKİYE'DEKİ EFL HİZMET ÖNCESİ ÖĞRETMENLERİN ÖZ-YETERLİLİK İNANÇLARI VE CLIL'E YÖNELİK TUTUMLARININ ARAŞTIRILMASI

Kassymova, Guzyal Yüksek Lisans Tezi, İngiliz Dili Eğitimi Yüksek Lisans Programı Tez Yöneticisi: Dr. Öğr. Üyesi Hatime ÇİFTÇİ

Haziran 2018, 85 sayfa

Bu tez ile CLIL öğretmen eğitiminin Türkiye'deki EFL öğretmen adaylarının özyeterlilik inançları, CLIL'ye karşı olan tutumlarına etkisinin ve öğretmenlerin anlattıkları derslerde CLIL anlayışının yansımalarının araştırılması amaçlanmıştır. Bu amaçla, 28 Türk ELT öğrencisi bu çalışmanın arka planını oluşturan teorik bilgiler, amaçlar, prensipler, dersleri planlama ve öğrenciye aktarma stratejileri ile ilgili CLIL'den eğitim aldı. Bu araştırmada kullanılan veri toplama araçları Öğretmen Öz-yeterlilik Çizelgesi, CLIL Deneyim ve Tavır Anketi,yarı-yapılandırılmış görüşmeler ve ders planlarını temsil etmektedir. Bu öğrenciler katıldıkları eğitimin kendi öz-yeterlilik inançları hakkındaki etkisinin ölçülmesi için eğitimden önce ve sonra Öğretmen Öz-yeterlilik Çizelgesi testine tabii tutuldular. Ayrıca tavır anketi ve yarı-yapılandırılmış yüz yüze görüşmelerle öğrencilerin CLIL'ye karşı olan tutumları araştırıldı. Son olarak katılımcıların ders anlatım planlarındaki CLIL anlayışının yansımalarını bulmak için eğitimi alan öğrencilerin son eğitim toplantısında hazırlayıp sundukları CLIL-tabanlı ders planları ayrıntılı açıklanarak analiz edildi. Bu çalışmanın bulguları, CLIL temelli öğretmen eğitiminin Türkiye'deki EFL hizmet öncesi öğretmen adaylarının öz-veterlilik inançları üzerinde istatistiksel olarak anlamlı bir etkiye sahip olduğunu ortaya koymuştur. CLIL'e karşı tutumlarını olumlu çıkartmıştır. Son olarak da, katılımcılar CLIL ve 4 Cs sistemini net bir şekilde anlayıp derslerinde planlamalarına yansıtmıştırlar.

Anahtar Kelimeler: CLIL, Öğretmenlerin Öz-Yeterlilik Inançları, Öğretmen Eğitimi

To my beloved mother

ACKNOWLEDGMENTS

First of all, I wish to express my deepest gratitude to my supervisor Assist. Prof. Hatime Çiftçi for her kind guidance, advice, feedbacks, encouragements and insight throughout the research. Without her greatest support since the very beginning of the research I would not be able to complete it. From the bottom of my heart I declare I cannot imagine being assigned to a better advisor for my thesis.

Furthermore, apart from my thesis supervisor, I would also like to thank my thesis committee: Assist. Prof. Hatime Çiftçi, Assist. Prof. Mustafa Polat, and Assist. Prof. Tuncer Can.

I would also like to thank the students who participated voluntarily in this study without hesitation. They were very supportive and helpful during the training period and data collection process. Without their participation and further help I would not be able to conduct this reserach. The words will never be enough to express my gratitude.

I would also like to thank my dearest mother, Farida Kassymova, my respected uncle and mentor Aziz Ziyayevich Aliev, DATÜB centre led by respected Ziyatdin Kassanov, because with their help I was able to be enrolled in this Master's programme. I want also to thank my family for their great support throughout my life. Without their understanding, and continuous support, I could have never been able to aspire for this level of education and complete this study. My last but not least thanks I want to express to my close friends who were always with me during my study supporting me and believing in me. I can never thank them enough.

TABLE OF CONTENTS

ETHICAL	CONDUCT	iii
ABSTRAC	T	iv
ÖZ		v
DEDICAT	ION	vi
ACKNOW	LEDGMENTS	vii
TABLE OI	F CONTENTS	viii
LIST OF T	ABLES	xi
Chapter 1:	Introduction	1
1.1	Overview	1
1.2	Theoretical Framework	3
	1.2.1 The notion of CLIL	3
	1.2.2 Strategies and parameters for CLIL implementation	5
	1.2.3 CLIL lesson framework	7
	1.2.4 CLIL teacher training	
1.3	Statement of the Problem	13
1.4	Purpose of the Study	14
1.5	Research Questions	14
1.6	Significance of the Study	14
1.7	Definitions	16
	1.7.1 English as a Foreign Language	16
	1.7.2 English Language Teaching	16
	1.7.3 Canadian Immersion Programme	16
	1.7.4 Content and Language Integrated Learning	16
	1.7.5 Content-Based Instruction	16
	1.7.6 Self-efficacy	16
	1.7.7 Teacher self-efficacy	16
	1.7.8 Descriptive analysis	16
	1.7.9 Inferential analysis	16
	1.7.10 Paired-samples t-test	16
Chapter 2:	Literature Review	17
2.1	Introduction	17

2	2.2	CLIL Teacher Training and Outcomes	.17
2	2.3	Studies on Students and Teachers self-efficacy beliefs and attitudes	
to	oward	ls CLIL	.24
2	2.4	Studies on CLIL Implementations and Outcomes	.26
Chapte	r 3: N	Methodology	31
	3.1	Overview	31
	3.2	Research Design	31
	3.3	Setting and Participants	32
	3.4	Procedures	33
		3.4.1 Data Collection Instruments	.33
		3.4.1.1 The Teacher Self-Efficacy Scale	33
		3.4.1.2 The Attitudes and Experiences in CLIL questionnaire	.34
		3.4.1.1 Semi-structured interviews	34
		3.4.1.1 CLIL lesson plans	35
		3.4.2 Data Collection Procedures	35
		3.4.2.1 Pre-test and post-test procedure	35
		3.4.2.2 CLIL teacher training design and procedure	36
		3.4.2.3 Semi-structured interviews	38
		3.4.3 Data Analysis Procedures	39
		3.4.4 Reliability and Validity	.40
		3.4.4 Trustworthiness	.41
	3.5 L	imitations	.41
Chapte	r 4: F	indings	43
	4.1 C	Overview	. 43
	4.2 R	esults on the Turkish EFL Pre-Service Teachers' Self-Efficacy	
	Belie	fs	43
	4.3 R	esults on the Turkish EFL Pre-Service Teachers' Attitudes towards	
	CLIL	·	. 48
	4.4 R	esults on the Turkish EFL Pre-Service Teachers' reflections of CLIL	
	unde	rstanding in planning lessons	. 52
Chapte	r 5: D	Discussion and Conclusions.	58
	5.1 C	Overview	. 58
	5 2 F	Discussion of Results for Research Questions	. 58

LIST OF TABLES

TABLES

Table 1 Overview of Data Analysis Procedure	40
Table 2 Paired Samples T-Test Results for TSS Data	44
Table 3 Descriptive Statistics for Attitude and Experiences in CLIL Data	48
Table 4 CLIL Component of the Lesson Plans (3 Cs)	54
Table 5 CLIL Component of the Lesson Plans (Communication)	55
Table 6 Activities in the CLIL Lesson Plans	55

Chapter 1

Introduction

1.1 Overview

One of the main principles of the modern secondary and higher education is multilingualism. According to the new policy of European Commission, "every European citizen should be fluent in two languages in addition to their mother tongue" (as cited in Surmont, Struys, & Somers, 2015, p. 29). Specialists and various research studies emphasize the importance of bilingual as well as multilingual education in terms of learners' academic achievements, personal and professional development, and life success. Adesope, Lavin, Thompson, and Ungerleider, (2010) stated that there is a strong evidence for cognitive benefits of bilingualism as it increases attention, improves memory, metalinguistic awareness, and other thinking skills (as cited in Sierens & Van Avermaet, 2014). Innovative language education has been employed a lot of bilingual, immersion, or content-based programmes in order to integrate the foreign language into teaching. Nowadays, there is a new educational approach called 'Content and Language Integrated Learning (CLIL)' which implies teaching different subjects such like academic, artistic, or technical, through the foreign language being taught at the same time (Pokrivcakova, Babochka, Bereczky, Bodorik, & Bozdogan, 2013). According to Cimermanova (2017), in CLIL based lessons, learners receive knowledge of the curriculum subject while learning and using the medium language simultaneously.

Nowadays, CLIL is integrated into the concept of language teaching in the majority of countries all over the world. CLIL in EFL context is highly necessary and crucial for many reasons. A great number of researchers in CLIL such like Coyle (2005), Dalton-Puffer (2011), Lorenzo, Casal, and Moore (2010), claimed that CLIL as a new teaching approach improves learning of foreign language as well as content acquisition, helps to develop such cognitive skills like metacognitive awareness, linguistic confidence, communicative skills, cultural awareness, and risk-taking (as cited in Lasagabaster & Doiz, 2017). According to Papaja (2013), due to the high linguistic expertise in CLIL lessons in terms of constant focus on reading and writing

activities, the learners develop their language proficiency. Further, the author highlighted that due to the demand for language and subject learning to use the integrative approach, students are expected to gain a number of specific skills and strategies. Therefore, to meet these expectations, it is, first of all, a role of teacher to provide the learners with the required knowledge and competencies related to CLIL.

A number of research studies have been conducted in the field of CLIL teachers' needs. According to Mehisto (2008), the administrators and teachers who are responsible for the CLIL implementation have still a lack of knowledge about CLIL, its nature, aim, principles, and strategies. Banegas (2012) likewise reported that teachers still do not possess the necessary knowledge about how to integrate content in their language classes or vice versa; from this unawareness comes their unwillingness to incorporate the required materials and methodologies into their lessons. Further, it becomes clear that there is a strong need to raise awareness about CLIL and training on CLIL among teachers and other stakeholders in this field. As Diaz and Requejo (2008) suggested, in order to implement successfully CLIL teaching into the real learning environment, a number of pre-service and in-service teacher education programmes must be developed (as cited in Banegas, 2012). The training of prospective teachers first of all addresses the needs of these teachers to become a successful CLIL professional in future. The training programmes have to guide the teachers in terms of theoretical and methodological knowledge about the CLIL principles, mainly, a successful integration of language and content knowledge.

It is well known that implementing CLIL is a complex work which requires more efforts, time, knowledge, and competencies. On the other hand, many teachers are still motivated to practice this approach. Therefore, it is crucial to start training teachers at their university preparation level. Bicaku (2011) proposed that it is necessary to train pre-service teachers who will further promote CLIL teaching in their practice. These training programmes have to convey mainly theoretical knowledge about CLIL as well as enable teacher trainees to practice this knowledge. Teacher training programmes have to address the most effective strategies to prepare pre-service teachers how to integrate teaching subject through the foreign language while teaching the language simultaneously. For this reason, the focus of our research is the introductory CLIL training course created for pre-service EFL

teachers. Analyzing the effect of the teacher training on the self-efficacy beliefs and their attitude towards CLIL before and after the course implementation will shed light on the effectiveness of CLIL teacher training course in terms of EFL pre-service teachers' perceptions. Additionally, giving the introductory training program about CLIL will contribute to the preparation of Turkish EFL pre-service teachers so that they will have the initial and basic knowledge and skills for teaching CLIL in their further teaching practice.

1.2 Theoretical Framework

The theoretical framework of this study will be presented by four main categories: notion of CLIL, strategies and parameters for CLIL implementation, CLIL lesson framework, and CLIL teacher training.

1.2.1 The notion of CLIL. Nowadays, CLIL is considered as one of the most innovative approaches to integrative teaching. However, the integration of content and language has a long tradition. One of the clearest examples is represented by Slovak teacher Matthias Bel, lived and worked in the 18th century (Pokrivcakova et al., 2013). According to the researchers, a long time ago this headmaster in pedagogy developed and practiced the idea of using a language as an instrument to teach the content of the curriculum. His aim was to develop the communicative competence of his students by reducing the amount of grammar teaching. Instead, Bel put more emphasis on teaching cultural context of the language they learned. Moving to the 20th century, due to the various geographic, political, and economic aspects, the design of specific bilingual learning instruction which implied language and content integration came into existence. At this time, so-called 'Immersion' programmes were developed in Canada. The immersion programmes served to develop foreign language fluency by using content-based teaching (Swain & Lapkin, 2005).

The emergence of CLIL in the European context as the more preferable educational approach was facilitated also by the gaps existed in Canadain Immersion programs. As Marsh (2002) reported, the immersion program was suitable only for Canadian linguistic climate where English and French are both common for the learners (as cited in Pokrivcakova et al., 2013). Therefore, in the European context, CLIL represented an advantageous option for integrative monolingual education.

CLIL has received its own concept in 1994 shaped by David Marsh. Further, a clear definition of CLIL was provided by Coyle, Hood, and Marsh (2010):

Content and Language Integrated Learning (CLIL) is a dual-focused educational approach in which an additional language is used for the learning and teaching of both content and language. That is, in the teaching and learning process, there is a focus not only on content, and not only on language. Each is interwoven, even if the emphasis is greater on one or the other at a given time. (p. 8)

According to Wielander (2013), CLIL is superior to other bilingual programmes due to its significant effect on the degree of language awareness and content learning, diverse methodologies, greater exposure to foreign language, development of communicative competence and metacognitive skills, greater authenticity, and increased learner motivation.

The main theoretical framework upon which CLIL's programme is based was developed by Coyle (2005) and called '4 Cs theory'. According to Ruiz de Zarobe and Jimenez Catalan (2009), this framework supports CLIL's ambitious aim to achieve multilingualism plus mother tongue. A brief summary of four key principles of 4 Cs model is as follows:

- 1. Content successful acquisition of knowledge, skills, and comprehension of the subject.
- 2. Communication the use of language as a mean to develop communicative competence and content learning as well as language learning at the same time.
- 3. Cognition challenging learners to build their own understanding during the learning process by developing higher order thinking skills for the students with any academic level. Here the author suggests applying Bloom's taxonomy which consists of higher and lower order categories of thinking skills.
- 4. Culture fostering students' tolerance and understanding of pluriculturalism, raising their intercultural awareness (Coyle, 2005).

These four elements of CLIL lesson model cannot be applied separately. Once teacher gives a CLIL instruction, he should connect all the 4 Cs and integrate them into the learning process. From this, it becomes clear that the integration of language

and content learning built on cognitive and cultural elements draws a new learning environment which is supposed to differ from traditional language or subject lessons (Coyle, Hood, & Marsh, 2010).

Further, it is important to clarify one of the principles of the 4 Cs theory – communication, which is suggested to be based on the theory of 'Language Triptych'. Coyle, Hood, and Marsh (2010) present the Language Triptych as follows:

- Language of learning the language which learners use to access new knowledge and understanding of the content.
- 2. Language for learning the language which is the medium in the learning environment which is used by the learners to operate.
- 3. Language through learning a new language appeared during the learning process.

Thus, it can be concluded that the 4 Cs model of CLIL principles represents a strong pedagogical and methodological basis for the sufficient CLIL teaching and learning.

- **1.2.2 Strategies and parameters for CLIL implementation.** Meyer (2010) introduced the core strategies intended to help teachers construct adequate CLIL-based lessons and incorporate the principles of 4 Cs model into the CLIL units:
 - 1. Rich input. This strategy means that in order to plan the lessons CLIL teachers need to adopt appropriate materials and tasks which are meaningful, challenging, and authentic so that the students while learning the content through the foreign language can refer the new input to their prior knowledge and abilities. This kind of input implies following elements: differentiated and self-targeted learning; multi-modal input (various methods to present subject such like converting text to graph, map, chart, or image, to meet students' individual learning styles and needs); videos, animations, posters, and other interactive materials in foreign language should transfer motivating; and illustrative and authentic content;
 - 2. Scaffolding. This strategy is important as it helps the learners to acquire successfully any level of authentic instruction. Due to the scaffolding strategy, students are able to receive cognitive and linguistic knowledge at any level, to

complete any task correctly, to develop their language proficiency. The main element of any scaffolding technique lies in its ability to foster students to easily understand and learn the content even with unknown words or sentences. Moreover, it should provide constant practice of the learning skills making them an integral part of every CLIL lesson. Finally, CLIL teachers should motivate students to produce their thoughts or describe any visual input in the target language.

- 3. Interaction. According to the author, successful language acquisition might be reached by using the language in a natural interactive environment. Therefore, CLIL teachers should create such authentic communicative situation where the students are asked to fill the gaps through the cooperative interaction. Following examples are provided to illustrate how to achieve authentic communication: students are asked to draw the graphs or charts according to the given information; students exchange the pictures and find mistakes; students have to write the subtitles in L2 for the video or movie given in their native language.
- 4. Intercultural dimension. The CLIL-based lesson should address cultural view on the subject and develop students' intercultural communicative competence. The students should be aware of not only general variations in cultures but also about their key features and hidden elements. Moreover, they have to learn how to follow the conversation being tolerant and non-offensive. The content should be presented and viewed according to different cultural perspectives.
- 5. Higher Order Thinking (HOT). CLIL-based instruction should focus on the development of students from their lower order thinking skills (LOTs) to HOTs. It can be reached through the effective CLIL teaching methodology which is based on the meaningful input, sufficient tasks, adequate output, scaffolding elements balanced to provide cognitive interaction. It is also important to mention a systematic language production which fosters the development of thinking skills.
- 6. Sustainable learning. This strategy implies the teaching methodology which provides such learning rooted in the learners' long-term memory consequently. The authors highlighted that due to CLIL's dual-focused nature (language and content integration), sustainable learning is of great value. Therefore, the

following strategies for the sustainable CLIL lessons are presented by the author: provide clear structures, connect the new information with the students' prior knowledge and consider their attitudes, balance teacher-centred and student-centered classroom environment, share the results of group work with all students by posters, Internet, or journals, make the learning autonomous, make strategic and effective transfer from students' L1 to the target language, focus on collocations and chunks instead of single words or word lists.

Nowadays, there is no any single model of the CLIL-based programme which can be applied in the same way in different countries across the world (Coyle, 2005). However, researchers are making attempts to create a methodological framework within which CLIL programme might properly function. Thus, Surmont, Struys, and Somers (2015) worked on the methods for the large-scale implementation of CLIL. The researchers argue that it is quite challenging to create a European framework for such an education system where the students better achieve in both language learning and subject matter coming from the different background. Further, they presented four parameters which are supposed to help overcome the main difficulty in CLIL wide implementation – the linguistic climate of different countries or regions. Thus, the researchers were convinced that CLIL would be implemented faster and more successful in such an area where there is an early standardization, absence of language threat, strong language dominance, and open language legislation.

1.2.3 CLIL lesson framework. There is no doubt that planning is a highly important part of the teacher's work. As it was already mentioned, there is no any particular CLIL-based programme which is universal for any country and any learner's background. However, the researchers from all over the world make an attempt to develop and offer various strategies, models, or tools which can help to plan and develop a CLIL-based instruction. As Pokrivcakova et al. (2013) emphasized, CLIL does not imply to teach a language through the wide load of content; to adopt a CLIL-based instruction it is important to teach the subject itself and focus on the language elements at the same time applying CLIL's principles and strategies. Coyle (2005) suggested the main strategies to apply the 4 Cs model in planning a CLIL lesson. First, a teacher should define the content as it is considered as the starting point of the planning. The next step is to relate this content to communication, to define a language necessary for the students to communicate and

work with the content. Another step is concerned with the development of thinking skills by exploring the types of questions and tasks. Finally, including the cultural dimension by teaching what does otherness and self mean.

CLIL lessons are supposed to integrate all four language skills such as listening, speaking, writing, and reading. According to Darn (CLIL: A lesson framework, 2015), involving content and language learning equally in a CLIL-based lesson, there should be followed a four-stage framework while teaching content. The first stage in this framework is processing the text what means analyzing the text and attach visual aids (heading, sub-headings, or illustrations) to help the learners acquire the content. The second stage is about identification and structuring the text (groups, hierarchies, history, or places) to foster cognition of both language and content. The third stage is concerned with the language identification which means analyzing the language of the content, providing it with the necessary linguistic information (adverbs, collocations, prepositional phrases, comparisons or contrasts) according to the simple or complex type of the language of instruction. Tasks design is the last stage defined by the author which implies the main characteristics - a variety of tasks considering the purpose and style of the learning as well as students' needs. Here, reading activities are suggested to be followed by listening (listen and fill in the diagram/map, listen and reorganize the information, listen and define the stages, listen and define the speakers). Productive skills' development should be related to the subject matter with the language support. The following speaking activities are suggested: question loops (questions and answers, terms and definitions, parts of the sentences), word guessing games, class surveys, describing visual materials by using the language support handout.

Ball (2013) suggested a system of four types of activities which might be implemented in a CLIL lesson. These types of activities are as follows:

- 1. Activities to improve classroom communication (role plays, discussions, filling in the gaps).
- 2. Activities for developing students' reading skills (reorganization of the text, mind-mapping, outlining).
- 3. Activities to foster students' oral and written production (presentations, movies, blogs).

4. Activities for developing students' higher cognitive skills (problem-solving, projects, experiments, situational tasks); (as cited in Pokrivackova et al., 2013).

Coyle (2005) also created so-called '3 As Tool' which is supposed to guide and support teachers while planning a CLIL lesson. There are three main stages of this tool. The first stage is to analyse what means a necessary process of analysis of the content related to the language of learning (keywords, specific vocabulary, and grammar constructions). The second stage is to add what means adding the language experience which helps learner to operate during the lesson (classroom talks, discussions, presentations). The third stage is to apply what means integrating the tasks in order to develop a higher level of thinking and cognitive skills (high leveled questions, brainstorming activities, raising cultural awareness).

CLIL-based instruction implies a learning process where the understanding of the content must occur together with the understanding of the language itself even if the content and activities are cognitively demanding what leads to the effective learning. However, cognitively demanding learning should address accessible language for better understanding. Therefore, Cummins (1984) created a CLIL matrix (see Figure 1) which demonstrates the relationship between the language and cognition and helps to adapt appropriate materials (as cited in Coyle, 2005).

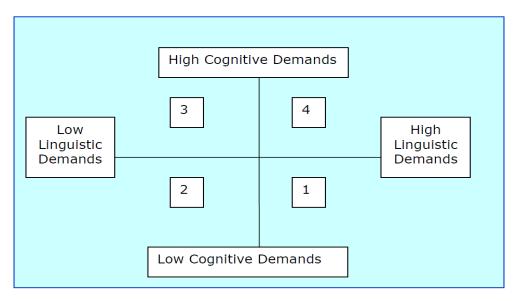


Figure 1. Cummins's (1984) CLIL matrix explaining the relationships between language and cognition. From "CLIL. Planning tools for teachers," by D. Coyle (2005, p. 9).

In order to provide a meaningful and supportive learning environment for the students in CLIL setting, teachers are needed to:

- build learner capacity,
- cooperate with colleagues,
- deploy strategies,
- build direction and focus during the teaching process,
- provide a safe and meaningful learning experience,
- develop and employ sufficient assessment strategies (as cited in Marsh, Mehisto, Wolff, & Martin, 2010).

Considering successful CLIL classroom management it is necessary to facilitate the integration of language and content together with the learning skills. Hence, Marsh, Mehisto, Wolff, & Martin (2010) suggested following strategies for classroom management which CLIL teachers should follow:

- Using divergent instructions to develop communication, group work, and leadership skills.
- Using adequate language during the classroom interaction.
- Taking into account learners' cultural and linguistic diversity, special needs, social and economic background, gender.
- Creating a favorable environment to foster students' motivation and active participation.

According to Coyle (2005), one of the main characteristics of CLIL approach is its flexibility and potential to be adapted to any type of school with different learners. Pokrivcakova et al. (2013) outlined the main principles for successful CLIL lessons which might be adapted according to the levels whether it is a primary, secondary, or tertiary level of education. Thus, primary CLIL classes require more emphasis on communication and active listening, focusing more on the language fluency instead of language accuracy, divergent assignments, differentiated instruction, real-world context, development of motoric skills and physical experience, constant repetition, practicing, reviewing, fun and relaxed environment (songs or games). Moreover, CLIL requires teachers to promote verbal intelligence and sufficient listening at the primary level by applying authentic materials and real

objects, teaching aids (pictures, posters, dictionaries with images), gesture sand movements. CLIL approach at the secondary level represents stronger cooperation of teachers, experiential learning, presenting content in a challenging manner, emphasis on the cognitive and higher-order thinking skills, retention and transfer, addressing the prior experience, promoting collaborative learning, focusing on the final product (presentations, interviews, mind-maps, posters), enhancing learners' motivation (presentation to the peers, parents, or teachers). Finally, CLIL at the higher education is suggested to be developed by EFL teachers in cooperation with subject teachers. Specific CLIL teacher training courses for pre-service teachers should be established and provided at the universities and institutions. In European tertiary education, CLIL-type instructions applied in the fields of law, business, engineering, medicine, economics, humanities.

1.2.4 CLIL teacher training. In order to promote CLIL teachers' professional and language skills, it is necessary to establish an official CLIL teacher training programme for pre- and in-service teachers (Kewara & Prabjandee, 2018).

The training provision is suggested to include theoretical and practical frameworks related to CLIL. Even though the necessary competencies and strategies for successful CLIL teaching are clearly identified, there is still a gap in an adequate preparation of the future CLIL teachers. The main reason here, according to Delicado Puerto and Pavon Vazquez (2016), lies in a poor collaboration between institutions and trainers as well as lack of attention paid to the training of teachers before they graduate. Banegas (2012) reported the following aspects to be taken into account while building up a teacher training programme: developing more CLIL course books and other materials addressing learners' real lives, providing future teachers with appropriate academic and practical aids, promoting an awareness about CLIL and its potential benefits. In this sense, it is of a great importance to develop and implement innovative and practical training instructions which will foster the student teachers to acquire basic principles and competencies for becoming a CLIL teacher.

There is no doubt that CLIL training programmes have to provide future teachers with more knowledge about CLIL and its practical experience. In particular, language teachers need to acquire basic knowledge of the subject while subject professionals require basic didactical knowledge and language skills (Pokrivcakova

et al., 2013). Meyer (2010) suggested that training should also provide the teachers with necessary tools and templates so that in future they can plan CLIL lessons, create and apply appropriate materials.

A sufficient number of studies and reports on CLIL teacher training experience share that in order to achieve successful training practice for initial teacher education as well as for their further professional development it is necessary to build the training provision based on the theory of CLIL and its practical framework (Banegas, 2012; Pokrivcakova et al., 2013; Ruiz de Zarobe and Jimenez Catalan, 2009). Thus, according to Ruiz de Zarobe and Jimenez Catalan (2009), the theoretical part of any teacher training programme on CLIL is supposed to involve main theoretical frameworks of CLIL approach (the 4 Cs model, CLIL matrix, Bloom's taxonomy). Considering a practical part of the training programme, the authors suggest that trainers should be oriented towards producing and presenting appropriate learning and teaching materials, lesson plans, and reflections. Finally, the teacher trainers themselves have to be qualified and competent in teaching CLIL at any educational level in order to lead a CLIL module successfully.

Banegas (2012) in his article presented some models of the CLIL teacher training programmes for both pre-service and in-service teacher preparation. In general, a programme for pre-service teachers consists of two terms (theoretical and practical). The theoretical term should involve the following aspects: CLIL definitions, aims, benefits, characteristics, contexts, content selection, theoretical frameworks, lessons planning, materials selection and adaptation, and scaffolding strategies. The tasks for pre-service trainees are suggested to be in the form of reflections on the memories and experiences, ideas exchange, or design. The practical part here represents group-work activities, task development, writing essays, or micro-teaching sessions. As for the training of in-service CLIL teachers, the author suggested developing the trainees' awareness of CLIL practices by providing the examples of successful CLIL experiences and their analysis. Moreover, in-service teacher training should focus on the lesson planning where the final stage will imply the development of CLIL lessons and their presentation. In addition, the author reported that CLIL trainers should practice systematic reflections and pedagogical implications as well as address teachers' needs and challenges.

From this, it becomes clear that during the CLIL training session the trainers should foster student teachers to develop their own practices after teaching them necessary theoretical background.

1.3 Statement of the Problem

Teaching through CLIL approach is highly advantageous but complex process requiring a set of necessary teachers' competencies, skills and knowledge, collaborative work between stakeholders, sufficient amount of experience in this field, and readiness of a country or a region to implement this programme in their context successfully. However, there is a lack of awareness among pre-service teachers as well as professional teachers about CLIL-based teaching approach, its theoretical background, aims and principles, strategies to apply and necessary competencies to acquire. Pavon Vazquez and Rubio (2010), Butler (2005) reported in their studies that one of the main dimensions that influence the failure in successful CLIL implementation is a lack of teachers' content or language knowledge as well as knowledge about CLIL (as cited in Banegas, 2012). In this regard, as Bicaku (2011) proposed, in order to become a professional teacher in CLIL-based practices, it is crucial to start preparing pre-service teachers at the university level by integrating specific CLIL teacher training programmes. These programmes are suggested to provide theoretical framework underpinning CLIL approach, effective strategies, and competencies which teachers need as well as practical exposure to the CLIL-based teaching.

Furthermore, the majority of studies conducted in the field of CLIL resulted in positive perceptions and attitudes of students, teachers, and other educational stakeholders towards CLIL approach. However, the studies still disregard the preservice teachers' attitudes towards CLIL, and Turkey is not an exception. As Yuksel and Kavanoz (2011) claimed, pre-service teachers are the keys to successful development and implementation of any educational programme in their future practice. Therefore, in order to find a way to the effective CLIL implementation in the modern educational system it is important to explore the attitudes and beliefs of prospective teachers about CLIL approach.

As regards the teachers' self-efficacy beliefs, Bandura (1994) defined that teachers' willingness to realize their potential is significantly influenced by their self-

perceptions and beliefs (as cited in Karimvand, 2011). Researchers from different educational fields found out positive correlations between teachers self-efficacy beliefs and their productivity, enhanced teaching strategies, and their professional goals (Karimvand, 2011). Tschannen-Moran and Hoy (2001) indicated that higher sense of efficacy is connected with teachers' willingness to apply new methods, approaches, and experiments. Therefore, this study is focused on investigating preservice EFL teachers' self-efficacy beliefs before and after the implementation of CLIL teacher-training course as it is assumed that the training programme may affect to some extent the students' beliefs about their teaching potential in terms of implementation and practice of CLIL-based approach.

1.4 Purpose of the Study

The ultimate purpose of this study is to measure and explore the effect of CLIL teacher training course designed on the basis of CLIL theoretical framework on preservice teachers' self-efficacy beliefs and attitudes towards CLIL as well as their understanding of CLIL in planning the CLIL-based lessons in Turkish EFL context.

1.5 Research Questions

In accordance with the purpose of the study mentioned above the research questions addressed in this study as follows:

- 1. Does CLIL teacher training have an effect on Turkish EFL pre-service teachers' self-efficacy beliefs?
- 2. What are the attitudes of Turkish EFL pre-service teachers towards CLIL?
- 3. How do Turkish EFL pre-service teachers reflect their CLIL understanding in planning CLIL-based lessons?

1.6 Significance of the Study

According to the data reported by Kirkgoz (2007), beginning with the first Anatolian high schools set up in the 1950s the English language became a medium of instruction in more than 193 schools across Turkey at that period. The author further informs that in 2002, according to the new educational policy, Turkish as a medium of instruction in science and math lessons in Anatolian schools replaced English due to the low level of teacher preparation in teaching subjects through English in

addition to the students' poor achievements. Apltekin (2002) claimed that it is of a great importance to set new pedagogical models aimed to teach English not only as a foreign language but also as an instrument of international and intercultural communication (as cited in Yildiz-Genc, 2011).

The emergence of CLIL in Turkish educational system is related to the 1970s when Anatolian high schools were established (Bozdogan and Karlıdag, 2013). According to the information published on the CLIL related web-page ("Turkey-An Overview of CLIL), nowadays CLIL approach is widely accepted and practiced in many schools and universities across Turkey. Moreover, Turkey actively participates in a number of international CLIL-oriented projects. Thus, within the framework of EU Contest, Turkey created and shared two lesson plans.

However, there is still a strong need for professional CLIL teacher training programmes in Turkish EFL context. Due to the insufficient results found in the previous studies exploring Turkish EFL pre-service teachers' attitudes towards CLIL and how they perceive their own teacher efficacy this study may contribute to the existing literature significantly by giving further insight into the topic. From the pedagogical perspective, the conducted research might be important as it sheds light upon whether Turkish EFL prospective teachers consider the possibility of integrating CLIL methodologies into their future teaching. Moreover, offering the introductory CLIL teacher training course is a remarkable attempt to provide the needs of educating future teacher professionals within dual-focused multilingual perspective and preparing them for a globalized world. The findings of this study may also help future teachers raise their self-efficacy beliefs, trigger administrators and teacher trainers to draw upon the study with respect to the need to enhance CLIL teacher training for future EFL teachers and how to make them able to incorporate it in a practical way.

1.7 Definitions

The terms presented below to refer their definitions were used frequently in the present study.

- **1.7.1 English as a Foreign Language** (**EFL**). This term means teaching and learning of the English language to those whose native language or first language is not English (Cambridge online dictionary, 2018).
- **1.7.2 English Language Teaching (ELT).** This term means teaching the English language to non-native speakers of English (Cambridge online dictionary, 2018).
- **1.7.3 Canadian Immersion Programme.** It means an educational approach aimed to develop foreign language fluency through the content-based teaching (Swain & Lapkin, 2005).
- **1.7.4 Content and Language Integrated Learning (CLIL)**. It is defined as a dual-focused approach to teach and learn content and language at the same time through a foreign language (Marsh, Mehisto, Wolff, & Martin, 2010).
- **1.7.5 Content-Based Instruction (CBI).** It is an 'umbrella term' for educational approaches aimed to teach and learn content and language with different emphasis on content/language during the lesson (Stoller, 2008, as cited in Cenoz, 2015 p. 10).
- **1.7.6 Self-efficacy.** It is associated with the person's beliefs about his abilities and potential to perform their work in such a way so that it influences his life to a certain degree (Badura, 1994, as cited in Karimvand, 2011, p. 171).
- **1.7.7 Teacher self-efficacy**. It is defined as a certain degree of teacher beliefs about his/her capabilities to affect students' performance (Badura, 1994, as cited in Karimvand, 2011, p. 171).
- **1.7.8 Descriptive analysis.** It is a type of statistical analysis undertaken to describe and characterize the data (Pagano, 2011).
- **1.7.9 Inferential analysis.** It is a type of statistical analysis aimed to infer to population or draw a conclusion about population (Pagano, 2011).
- **1.7.10 Paired-samples t-test.** It is a type of inferential analysis used to describe the data come from a single group of sample measured twice, in pre- and post-tests (Huck, 2012).

Chapter 2

Literature review

2.1 Introduction

The empirical studies referenced in this chapter were organized according to three parts. The first and the main part of this literature review will illustrate the research findings on CLIL teacher education. The second part will present the studies related to the perspectives of students and teachers towards the implementation of CLIL approach. The last part will cover the studies on the implementation of CLIL approach and further outcomes both worldwide and in Turkey.

2.2 CLIL Teacher Training and Outcomes

Mattheoudakis (2017) claimed that "CLIL teacher training needs to be centrally coordinated and organized in collaboration with the academia. It needs to be meaningfully integrated in our teacher training system and target both pre-service and in-service teachers" (p.18).

To start with, a sufficient number of CLIL teacher-training programmes and their outcomes were reported in Banegas (2012). One of the programmes outlined in his work related to the course existing in the context of the Warwick University (Britain) which was attended by pre-service EFL teachers in Malaysia and called "Content in the Language Classroom" (CILC). The module of the programme was generally divided into two terms, where the first term covered the theory and practice of content-based English language teaching, and the second term promoted the development of the teachers' practical skills in teaching CLIL lessons through the literature texts. Another collaborative research project mentioned Banegas (2012, p. 50) was conducted by Hunt, Neofitou, and Redford (2009). The training programme covered such areas like CLIL rationale, examples of successful CLIL teaching practices, and creating CLIL-based lesson plans. The project resulted in the development of CLIL lessons by the trainees and their further teaching. Hunt (2011) described and evaluated one more collaborative action research provided so-called "e-based Content and Language Integrated Learning Training" where a number of European countries participated. The training included both the face-to-face and the online sessions held for CLIL trainers, pre-service and in-service schools subject teachers. The attitude questionnaire revealed the participants' positive perceptions about the face-to-face meetings, while the online sessions were not preferred (as cited in Banegas, 2012).

Gutierrez Almarza, Duran Martinez, and Beltran Llavador (2012) in their research article presented an international CLIL project based on school programme and established by the University of Salamanca. The project was launched in 2007 when two universities from England and Spain decided to cooperate and determined the aims and the locations of the project. The main aim of the project was to plan and implement a CLIL unit in six schools, in Spain, and in England. The coordinators and teacher trainers had to find a topic for the unit and create teaching materials. The project lasted 10 weeks, for a half of a day in a week, with the evaluation phase at the end of the unit. The schools from both countries prepared various teaching materials and online resources exchanging with each other, whether it is video, brochure, or website. Finally, it was decided that "Christopher Columbus" was a topic, and the course plan was designed according to the Coyle's (2005) 4Cs framework of CLIL. Therefore, the activities and materials were adapted in accordance with two main categories, the use of the target language and learning FL within different content areas, and four aspects of CLIL instruction: content, cognition, culture, and communication. The main outcome of the project according to the perspectives of teachers, students, and parents was that CLIL is beneficial teaching approach. The students shared positive views on the lessons as they learned more about Columbus, gained higher confidence in language use, and enlarged their vocabulary. They also appreciated working in groups as it allowed them to develop their communication skills. From the teachers' perceptions, this CLIL-based unit turned out to be truly novel in their practice and enabled them to integrate language and content teaching. Parents were satisfied with the course in terms of their children being highly motivated and engaged in the lessons and out of schools. Finally, parents witnessed that their children used FL more in a natural way.

Novotna and Prochazkova (2013) in the context of Czech Republic described the process of CLIL didactics course designed for future Maths teachers (as cited in Pokrivcakova et al., 2013). The authors first provided a brief history of original CLIL

courses established at Prague University. The training programme included face-toclasses covered various aspects of bilingual education as well as the use of language teaching methods in teaching subjects, and then e-learning lessons were integrated. The given CLIL teacher training programme was blended containing introductory and closing sessions whereas between the sessions there were e-learning units on theory, methodology, and principles of CLIL. Moreover, the training programme provides trainees' feedback in form of anonymous online questionnaires. The results taken from the questionnaires show more positive attitude towards CLIL considered as quite useful in the students' teaching practice.

According to Bruning and Purranann (2014), in Germany, CLIL teacher training system is quite successful and the training process is excellent. The main aspect of German teacher education is the fact that future teachers usually choose two subjects (language and non-language) to study which is similarly to the main idea of CLIL instruction. However, the authors claimed that in German context CLIL and other forms of bilingual education are implemented in the department of language education so that the language became the main focus of teacher education while the content is less emphasized. Another interesting fact related to the German CLIL teacher training experience mentioned by the authors is that the training system consists of two phases. The main feature of the second phase is that the trainee who already works as a teacher continues to study participating in reflections and discussions at different seminars. Considering higher education, the authors highlighted Braunschweig University, where CLIL is integrated into the Master programme together with various subjects like History, Chemistry, and Mathematics. Finally, the researchers suggested that despite the number of successful CLIL teacher training programmes in Germany, there is still a lack of certain standardized system.

A comparative research study conducted by Banegas (2015) in Argentinean context investigated 47 in-service teachers who were trained at that period to get their ELT certificates within the Didactics training course. The data were obtained from the CLIL-oriented surveys and CLIL-based lesson plans. The analysis of the surveys reporting the extent to which the participants used CLIL teaching strategies in their practice demonstrated that the most frequent answers were 'always' and 'often' what means that the teachers experienced CLIL-based instruction in their EFL lessons. However, the results showed that the language dimension was less

emphasized in the content learning. Moreover, the teachers demonstrated low level of vocabulary focus in their lessons. Finally, their lessons were considered as more teacher-centred than learner-centred. As for the content analysis of the submitted lesson plans, all the lesson plans were structured under the common lesson planning templates with 80-minutes lesson duration, and involved three stages such as warmup, development, and closure stages. Among the subjects integrated into the EFL lesson plans, such areas as Geography, Biology, History, Technologies, Literature, and Religions were chosen. Regarding the language part of the lesson plans, the majority of the works involved such functions like describing, expressing views, narrating whereas the grammar structures covered tenses, voices, and comparative/superlative forms. All the lesson plans were focused on the vocabulary learning and specific terminology. Three main aims, content, language, and learning, were addressed in the majority of the lesson plans. The activities presented in the lesson plans were concerned with the content, language, and cognitive development. For the content activities there were involved reading the text with true/false questions, mind maps, or terms and definitions; the language activities were aimed to raise the metalinguistic awareness; as for the cognitive development, the activities were structured from simple to more complex according to the cognitive theory demands. For the student engagement, the activities were supposed to be done in pairs or groups. Finally, such materials and tools like audio-visual, Internet, interactive boards, laptops and netbooks, worksheets from CLIL-oriented resources were listed in the lesson plans.

Delicado Puerto and Pavon Vazquez (2016) presented a research on Spanish teacher training in CLIL through the collaboration between university students and in-service bilingual instructors. This collaborative research project aimed to investigate the degree to which the professional teachers are motivated and willing to collaborate with universities to prepare teacher students, which areas these teachers should focus on, and to shed light on teaching plans, materials, strategies, and methodologies applied in the project. The participants consisted of university teachers, primary bilingual school teachers, consultants and one advisor. Six workshops of two hours were held during the first year of the study. The teachers' personal information, expectations from the workshops, and their level of motivation to collaborate were gathered through the close-ended questionnaire provided in

English. Semi-structured interviews were designed to collect data about the participants' views on the knowledge and skills student teachers should learn. An online platform was opened for teachers' comments and discussions. The main findings demonstrated quite positive perceptions of the majority of bilingual teachers about the project considering as an innovative and beneficial initiative. Despite the participants' uncertainties concerned with collaboration, their role in the training was described as an active, initiative, and real-world. Instead of bringing the theory into the official training program, the teachers suggested the students visit the real classes in bilingual schools. A great majority of the professionals were highly willing to share their knowledge, experience, and resources with the university members.

De Santo and De Meo (2016) described a blended CLIL teacher training course comprised face-to-face classes and online sessions provided by Web 2.0. virtual tool. The research highlights the importance of this course with regard to the trainees' interactions and the role of e-trainers. In this study, 35 subject teachers having advanced or upper-intermediate English language level participated in CLIL teacher training course provided by means of Moodle virtual class where two e-tutors monitored the lessons. The first quantitative questionnaire was adapted to explore the students' learning needs, expectations from the course, and their competences. At the end of the course, the second questionnaire was employed to investigate the trainees' metacognitive views, their attitude towards the content, materials, activities, and methods. Concerning the qualitative data, the forum interactions and the tutors' selfobservation questionnaire were used. According to the forum posts, the online interactions between students and tutors constantly lasted. Moreover, it showed successful acquisition of theoretical and methodological knowledge as well as positive interpersonal communication within the learning environment. The selfobservational responses indicated the tutors' concerns about poor willingness to communicate, difficulties in communication and task understanding. Overall, the study resulted in positive feedback and encouraged the researchers to proceed in this field in future.

Perez Canado (2016) in his article presented the results of an independent large-scale European research aimed to investigate training needs for CLIL teachers in Europe. For the research sample, 706 Europeans including pre-service teachers, teacher trainers, in-service teachers, and coordinators were chosen. The following

four types of questionnaires were employed as data collection instruments: demographic, background, opinion, and value questionnaires exploring the current state of training needs CLIL teachers require. The results indicated an excellent level of the participants' linguistic and intercultural competence. However, considering the respondents' theoretical knowledge on CLIL and the professional development, the results demonstrated inadequate or scarce level. As for the training needs of participants, pre-service teachers turned out to have the highest results. Among the teacher trainers, the current level of linguistic and intercultural competence, as well as the teacher training, had quite a negative outlook. Overall, the majority of European participants, mainly trainers and pre-service teachers, shared that it is necessary to improve current teacher training methodology and strategies.

Another Spanish researcher, Guadamillas Gomez (2017), reviewed CLIL training course provided for the fourth-year EFL pre-service teachers in one Spanish university. This case study was aimed to reveal students' perceptions about the CLIL training course and the assessment method implemented in this course. The training programme of the CLIL course integrated theoretical and practical content aimed to encourage students to develop lesson plans according to the CLIL approach. A group of participants in this qualitative research comprised 50 students from the Faculty of Education at their fourth year. Data collection process involved two questionnaires, the one which explored the perceptions about CLIL course process and the one which focused on the perceptions about the assessment process of the course. The questionnaires were administered at the end of the training programme when the course and the evaluation were completed. The results from the first questionnaires demonstrated that the majority of students were satisfied with the training and emphasized the micro-teaching lessons which helped them practice their skills. The comments showed that the majority of positive perceptions were related to the practical activities, preparation of the materials and tasks. However, the theoretical part of the course gained mostly negative views as the students found it difficult to understand CLIL's theoretical framework. Considering the second questionnaire, the results indicated mainly positive perceptions of students on the assessment process whereas 50% of the respondents considered the assessment effective and useful.

As for the Italian context of CLIL teacher preparation, Aiello, Di Martino, and Di Sabato (2017) in their mixed-method research provided an insight into the Italian

CLIL teachers self-perceptions and their actual English language proficiency level as well as their willingness to communicate (WTC) in the target language in the classroom. The participants prepared for future CLIL teaching consisted of 35 teachers have passed an oral and written assessment test. During the assessment period, the researchers observed the participants in order to get a general picture of their behavior and characteristics. Another data collection instrument was represented by the unstructured interviews about the teachers' views, feelings, and experiences on teaching in L2. The results revealed that the main predictors of the teachers' low WTC in a foreign language were anxiety about foreign language instruction and perceived L2 communicative competence. The research also revealed that the difference between the teachers' self-assessed and actual level of English language proficiency was not statistically significantly different though below the required C1 level.

One of the recent studies on CLIL teacher training was conducted in Thailand by Kewara and Prabjandee (2018). In accordance with Thai new educational policy about the teaching content-subjects through a foreign (English) language, this study investigated the effectiveness of the CLIL teacher development programme and the extent to which the CLIL instruction was used by the teachers in their content lessons. The participants in this programme comprised 15 teachers from one secondary school in Thailand while 4 people from the group of participants were chosen to be observed and interviewed further. The training programme presented first the theoretical knowledge about CLIL, principles, methodologies, lesson structure, and teachers' role. Then, the trainees created their own lesson plans and presented them in classrooms. The results mainly demonstrated the teachers' positive views about the CLIL's effectiveness in students' language development. However, the teachers' proper knowledge about the structure of CLIL lesson had misconceptions. Moreover, participants had wrong conceptions about the role of English in CLIL lessons as the teachers mostly translated their usual content instruction from Thai to English instead of integrating language and content. According to the researchers, this fact indicated that the teachers had low confidence and the English language proficiency level. Despite what the teachers learned throughout the course, they still used their habitual lesson instruction and made the lessons teacher-centered where the students had fewer opportunities to interact, discuss, or debate. According to the interviews, the teachers did not believe in the power of CLIL instruction as they complained that it requires much time, efforts, and energy to prepare appropriate materials and lessons plans, finally, the majority of the participants indicated that it is a responsibility of the schools' heads to create a specific training programme for non-language teachers to teach CLIL lessons and provide a specific curriculum within the CLIL framework.

2.3 Studies on Students and Teachers self-efficacy beliefs and attitudes towards CLIL

Concerning the teachers' attitudes towards CLIL, Dalton-Puffer, Huettner, Schindelegger, and Smit (2009) interviewed 28 teachers from Austrian HTL colleges about their beliefs. In terms of language learning, subject teachers stated that CLIL promoted constant language learning. They also considered CLIL as additional to the classroom instruction but not substitute. However, content teachers did not have a concrete aim to improve students' language competence despite teaching specific subject terminology. The participants mentioned that CLIL was successful at making students feel better when speaking in English. Overall results of the study demonstrated the teachers' strong feelings of responsibility.

A case study by Bozdogan and Karlıdag (2013) conducted in Turkey looked at the positive and negative perceptions of 15 state university students from different departments towards their CLIL practice. Data collection instrument employed in this qualitative study was a semi-structured interview of 11 questions. The results related to the advantages of CLIL perceived by the respondents indicated CLIL as fostering the students' English language proficiency, enabling them to study or work abroad, giving them a feeling of success and confidence, academically better. As for the perceived disadvantages of CLIL, the students considered content learning in English difficult. Moreover, they mentioned learning terminology, unknown vocabulary, studying for the exams as the most challenging for them.

Pokrivcakova et al. (2013) surveyed 35 Slovak elementary schools teachers who used CLIL in their classrooms about their personal views on CLIL. Data collection was conducted by means of specifically developed qualitative CLIL survey consisted of open-ended questions and items. The results of the questionnaire related to the teachers' initial impressions about CLIL teaching revealed uncertain

views from very positive, neutral, to negative. The teachers also indicated that they felt unprepared and lacked competence in teaching CLIL whereas their students, on the contrary, were willing to engage in these lessons and had mostly positive attitudes. Considering the teachers' further shifted attitudes towards CLIL, there were positive results as the teachers became satisfied with their experience and defined CLIL professionally challenging. Besides all the benefits of CLIL the teachers illustrated, some gaps were also outlined: there are high demands for teachers and learners, lack of relevant materials and resources as well as problems with balancing content and language teaching.

De Mesmaeker and Lochtman (2014) investigated professional identity of 80 Belgian secondary school CLIL-teachers by using the online survey of Teacher Self-Efficacy Scale. The results demonstrated low scores of self-efficacy beliefs regarding the general aspects of teaching. The researcher mentioned the participants' low confidence in motivating students for school work and helping them value their learning.

A study carried out by McDougald (2015) on teachers' attitudes, perceptions, and experiences related to CLIL among 140 teachers from different schools and universities in 15 Colombian cities through the web-based survey revealed that the majority of the teachers' had not enough knowledge of CLIL. However, more than a half of the participants expressed positive attitudes towards their CLIL teaching experience. They considered CLIL approach as beneficial developing mostly language skills. The teachers also expressed that they need more knowledge about the methodology and content, knowing how to adapt this methodology to the students' needs. Finally, the majority of the teachers stated that lesson planning and teaching through CLIL requires more time.

Griva and Chostelidou (2017) established a project on cultural learning called "Multiculturalism and citizenship" based on CLIL approach. The main purpose of the study was to gauge students' (six graders) attitudes and perceptions towards the effectiveness of CLIL approach in learning cultural awareness. Moreover, with the help of the course, the researchers wanted to enhance students' multicultural awareness and increase their knowledge of cultural and linguistic diversity. The participants from two Greek schools during a period of fourteen weeks went through

the course involving a number of multicultural activities, games, presentations, and workshops in pairs and in groups. The data were gathered by means of teachers' journals and follow-up structured interviews. The overall findings demonstrated students' positive attitudes towards the CLIL project and its effectiveness in terms of decreasing racial conflicts, reaching cultural acceptance, and breaking stereotypes. The majority of the participants claimed that learning through CLIL helped them to enhance their cultural vocabulary, to acquire content knowledge in a better way as they learned a variety of cultures and became more familiar with human rights. Moreover, the activities improved the students' communication in L2 during the course.

Soler, Gonzalez-Davies, and Inesta (2017) conducted a case study of three Catalonian schools to learn the schools' stakeholders' perceptions of the effectiveness of the implemented CLIL programmes. In the first stage of the research the data were collected by the semi-structured interviews with fourteen participants, and in the second stage, six CLIL groups were observed by the researchers. The analysis of the results revealed that in all three schools the participants considered the initial gradual implementation of the programme as a crucial factor in its success. The principals participated in the research claimed that the teachers should be active, competent, motivated, and confident in order to reach a successful programme implementation. Another key factor of the effective programme mentioned by the participants was a network of schools and professionals who should also create a 'CLIL culture'. Overall, more than 90% of the participant shared a positive attitude towards CLIL programmes.

Yessenova (2017) conducted a research in Kazakhstan investigating self-efficacy beliefs of Science and Maths pre-service teachers about their capabilities in teaching subjects through English. For this purpose, the researcher conducted semi-structured interviews. The results revealed the participants' low level of self-efficacy beliefs about their abilities to teach in English. Further, the students shared their view of the needs in professional CLIL teacher training programmes for pre-service teachers so that their teaching confidence might be increased.

2.4 Studies on CLIL Implementations and Outcomes

It is important to start with the studies related to the issue of CLIL implementation in various countries including Turkey to see the effectiveness of those programmes in terms of learning outcomes. As for the one common feature which all successful CLIL programmes include, Ruiz de Zarobe and Jimenez Catalan (2009) mention "that they are programmes of varying length that provide, nevertheless, a substantially greater and better exposure to the target language" (p. 36).

Loranc-Paszylk (2009) conducted a contrastive research in Poland related to the effect of CLIL methodology on the learners' linguistic achievements assuming that CLIL-based lessons bring about an excellent influence on the language learning through the integration of reading and writing skills. The purpose of the research was to compare both experimental (CLIL) and control (non-CLIL) groups in terms of their progress in reading, writing, and grammatical competence skills. A CLIL group was studying the History of European Integration in English during the two academic semesters, adapting various texts taken from the Internet, completing reading exercises, presenting opinions, participating in class debates and discussions, finally, they presented home works in form of comparison and contrast essays. The CLIL course was designed and organized according to the stages of feedback, presentations, practicing content and language aspects of the course, and production part. The control group studying International Relations followed traditional language course focused more on the grammar learning. This group at the end of the course had to produce ten narrative and opinion essays. The research used following data collection tools in form of pre- and post- tests: the standard test from Cambridge ESOL exam for measuring students' academic reading and writing skills, and the Use of English test of Certificate of Advanced English - to assess the grammatical competence of the participants. The results demonstrated that in posttests, the experimental CLIL group showed significantly higher progress than the control group concerning academic reading, writing, and grammatical skills. The control group demonstrated a very low progress in post-tests in terms of all three skills.

Another interesting study conducted by Chansri and Wasanasomsithi (2016) in Thailand explored the effect of CLIL on undergraduate students studying Agriculture, their writing abilities, agricultural content knowledge and cultural awareness. The students in the amount of 27 people at an age between 18 and 21 went through the specific CLIL course designed in six units according to the 4Cs framework (agricultural content, English language writing skills, thinking skills, and cultural awareness in agricultural context). As the design of the study was one-group pre- and post-test experiment, three data collection tools such as agricultural content test, writing test (cause and effect text and process writing types), and cultural test were used as pre- and post-test, whereas semi-structured interviews were applied after the implementation of the CLIL course. Overall findings proved the effectiveness of the implemented CLIL course in terms of all four aspects of the study purpose. There were significantly higher results in writing post-test as the students' writing abilities increased: better-organized paragraphs, more detailed content, better word choice, improved grammar, fewer errors. Students' content knowledge and cultural awareness were statistically significantly higher in post-tests. Finally, in semi-structured interviews exploring students overall attitudes towards the implemented CLIL course participants agreed that CLIL helped them to improve their language abilities, promoted their content and cultural knowledge as well as promoting their writing process.

One recent research conducted by the Greek authors Kalogerakou, Baka, and Lountzi (2017) investigated the integration of CLIL programme in Science through the small-scale project of Biology and Home Economics modules. The purpose of the project was to integrate content and language during the teaching period of three months when the two subjects were taught. The language lessons provided CLIL instruction and then the knowledge was practiced and tested during the subject lessons. Both subject and language teachers worked in collaboration and provided various tasks fostering content and language knowledge (task-based learning, group presentation, jigsaw tasks, dictation, crosswords, quizzes). At the end of the teaching period, the students were asked open-ended questions about how interesting were the lessons and to what extent did the learners comprehend the modules. Overall, the students' attitude towards the project integrated the CLIL approach was positive. The majority of learners were satisfied by the lessons conducted in English considering them as 'quite easy'. Moreover, the materials used in the lessons such as videos, games, quizzes, helped the students to learn best.

Muszynska, Urpi, and Galazka (2017) made an action research examining a CLIL practice in combination with drama in order to create a real language environment and meaningful learning. Two groups from one Spanish university participated in "The Arts Education Project" comprised rehearsals and drama performances. A drama-CLIL group went through the teaching period learning content about drama techniques and theatre together with the guidance of drama teacher, whereas a control group did not take a drama education but took part only in the performance. As a result, the students from an experimental group presented more professional and interesting performances compared to those from a control group. The findings also revealed the efficacy of drama in language learning as it promoted learners' competence acquisition and shared the learning experience. Drama use also affected cross-curricular content and language teaching, developed such skills as problem-solving, decision making, and metacognitive skills.

Concerning the studies on the implementation of CLIL conducted in the Turkish context, Demirdirek, Özgirin, and Salatacı (2010) analyzed the use of e-documentaries within a content-based instruction (CBI) to see the effect of the videos from various TV programmes or from the school library on the content and language learning. The respondents, 41 students and 21 instructors, from Sabanci University completed an online survey employed as a data collection instrument. The findings revealed that the e-documentaries turned out to be beneficial in learning the content and language. While the students responded that the content videos encouraged a better understanding of the theme, the teachers suggested that the videos helped to develop vocabulary knowledge.

Kiraz, Güneyli, Baysen, Gündüz, and Baysen (2010) carried out a correlational study to gauge the impact of teaching science and technology through CLIL to the eighths graders of some schools in Northern Cyprus. For the data collection instruments, attitude questionnaire and success test related to the science and technology course were employed. The results taken from the success test demonstrated significantly low scores. However, the students' attitudes towards learning in English turned out to be significantly higher.

Another Turkish study conducted by Bozdogan and Karlidag (2012) aimed to explore the implementation of CBI as one form of CLIL at the Faculty of Arts and

Sciences in a Turkish state university. The participants of the study were nine teachers delivering Biology, Math, Physics, and Chemistry courses through the CBI. Data were gathered by means of lesson observations and semi-structured interviews explored the implementation of CBI in the classes. The analysis of the data illustrated that it was beneficially to teach science in L2 so that the teachers preferred mostly this method to teach. As for the linguistic learning, the lessons observations showed that the students mostly developed their receptive skills while speaking turned out to be neglected in classroom interactions, the students tried to avoid answering in L2 or switched back to Turkish to give more clear and open answer. Overall findings illustrated that the teachers made emphasis more on the content learning rather than on the language acquisition.

The review of literature presented above indicated a great variety of the results in the field of CLIL implementation, but mostly these findings revealed positive outcomes in terms of learners' academic achievements. The reported studies also showed that there is still a lack of successful CLIL teaching training programmes which serve to develop highly competent and professional CLIL teachers, especially in Turkey. Concerning the studies on the beliefs of educational stakeholders, mainly students and teachers, the reviewed results thoroughly illustrated positive attitudes towards CLIL approach as well as the perceived disadvantages which CLIL has nowadays.

Due to the limited number of studies in the field of Turkish EFL both pre- and in-service teachers' self-efficacy beliefs on CLIL, teacher training programmes as well as CLIL as a specific educational approach, further research is needed to make contributions to the theory. To this end, this study is supposed to provide further insight into analyzing future teachers' beliefs and attitudes about CLIL as well as the reflections of their CLIL understanding in planning lessons after integrating an introductory CLIL teacher training course in Turkish EFL context.

Chapter Three

Methodology

3.1 Overview

The third chapter covers the methodology part of the study in detail, including research questions, research design, setting and participants, data collection instruments, data collection and data analysis procedures, reliability and validity, as well as limitations of the study respectively.

The study was guided by the following research questions:

- 1. Does CLIL teacher training have an effect on Turkish EFL pre-service teachers' self-efficacy beliefs?
- 2. What are the attitudes of Turkish EFL pre-service teachers towards CLIL?
- 3. How do Turkish EFL pre-service teachers reflect their CLIL understanding in planning CLIL-based lessons?

3.2 Research Design

The present study is represented by a mixed methods design as there were applied both quantitative and qualitative research methods (Small, 2011). According to the author, mixed-methods design implies at least two different kinds of data, tools for data collection, or analytical techniques. According to Burke Johnson, Onwuegbuzie, and Turner (2007), mixed methods research methodology is aimed to collect, analyze, and combine qualitative as well as quantitative data in the same research to gain a deeper understanding of the phenomenon being studied.

Creswell and Clark (2017) mentioned four main types of mixed methods design such as triangulation design, embedded design, explanatory design, and exploratory desogn.

This research is aimed specifically at the explanatory type design which consists of two sequential phases: first, quantitative and second, qualitative. The quantitative part of the research consisted of pre-test and post-test questionnaires. The qualitative phase included the trainees' semi-structured interviews and their lesson plans.

3.3 Setting and Participants

The research was carried out in a foundation university in the northwest of Turkey and lasted for a spring semester of the year 2018. The specific context of the study was the Department of English Language Teaching aimed to prepare prospective language teachers providing them with solid knowledge, necessary skills, methodology, language acquisition, instructional strategies so that the students gain a great potential to become a competent teacher in any level of education.

The target population determined for this study is Turkish EFL pre-service teachers. Considering the sample selection, as Tongco (2007) stated, sampling is a technique of involving people in the research so that they will represent the population efficiently and provide solid and relevant data. The present study utilized nonrandom purposive sampling technique. According to Dörnyei (2007), this type of research sampling implies selection of certain participants based on the knowledge and experiences as well as characteristics relevant to the purpose of the study. As a result, the sample of the present research study involved 28 Turkish undergraduate students selected as participants from Faculty of Educational Sciences, Department of English Language Teaching (ELT) at the above-mentioned university.

Considering the program in which the students were involved in the Spring semester 2018, the participants' course program included following subjects: Instructional Technologies and Material Design, Applied Linguistics, English Literature, Teaching Language Skills, and Language Acquisition. Despite the fact that the students participated in the study had different age and grades (2nd, 3rd, and 4th-year students), all of them were taking the same departmental elective course where the CLIL teacher training took place.

For all participants, Turkish was their native language while only one student mentioned his native language as German. Their age ranged from 20 to 24 years old, and one of the participants was at an age of 32. The sample consisted of 4 males and 24 females. Among all 28 participants, 24 students defined their level of English language proficiency as Advanced, whereas 3 students defined their level as Upper-Intermediate, and only one student was at the Intermediate level.

3.4 Procedures

In this subsection of the methodology part, the procedures necessary to conduct the study is described in detail.

3.4.1 Data collection instruments. The study set out to explore the effect of CLIL-based teacher training on Turkish ELT students' self-efficacy beliefs and attitudes towards CLIL. In other words, the extent to which the students' self-efficacy beliefs and attitudes changed after receiving CLIL training course. Moreover, the research investigated the reflections of the participants' understanding of CLIL in planning lessons. To find out this information the researcher utilized four instruments such as the Teacher Self-Efficacy Scale, the Attitude and Experiences in CLIL questionnaire, semi-structured interviews, and CLIL lesson plans.

3.4.1.1 The Teacher Self-Efficacy Scale (TSS). As stated previously, the main purpose of this research was to measure the pre-service teacher self-efficacy beliefs before and after the implementation of CLIL-based teacher training. According to Armor et al. (1976), teacher self-efficacy beliefs turned out to be strongly connected with students' academic achievements, motivation in learning, and classroom behavior of students as well as of teachers themselves (as cited in Tschannen-Moran, W. Hoy, and A. Hoy, 1998).

For the purpose of exploring participants' self-efficacy beliefs quantitatively, the original Teacher Self-Efficacy Scale (TSS) created by Tschannen-Moran and Hoy (2001) was implemented as the primary data collection tool in the present study. Based on the research purpose, the scale was administered twice during the data collection procedure as pre-test and post-test.

Originally, the scale is based on three main dimensions aimed to examine the teacher self-efficacy beliefs, such as beliefs about instructional strategies, classroom management, and student engagement. The three subscales of teacher self-efficacy beliefs contain 24 items in total which were initially analyzed by the developers for reliability and construct validity and based on a 9-point Likert scale (see Appendix A). According to Tschannen-Moran and Hoy (2001), the reliability of instructional strategies subscale is 0.91, classroom management – 0.90, student engagement – 0.87, whereas for the whole scale the reliability was estimated as 0.94.

At the end of the research, both pre-test and post-test data were compared with the use of descriptive and inferential statistics in order to get a statistically significant picture of the relationship between the student teachers' self-efficacy beliefs and CLIL teacher training course they went through.

3.4.1.2 The Attitudes and experiences in CLIL questionnaire. In order to address the second research question aimed to explore the Turkish EFL pre-service teachers' attitudes towards CLIL, the Attitudes and Experiences in CLIL questionnaire was retrieved from McDougald (2015). The original version of the questionnaire was presented by Savic (2010) which was consisted of 20 items in total. For the present study, the questionnaire was slightly modified in accordance with the research aims. Thus, out of 20 items of the questionnaire only 17 items considering the attitudes of the respondents towards CLIL were chosen for the research. The questions were based on the 5-point Likert scale ranged from 5 = 'Strongly Agree' to 1 = 'Strongly Disagree' (see Appendix B). The questions were completed in the first week of the study as pre-test administered together with the TSS, and then, similarly in the last week as post-tests.

3.4.1.3 Semi-structured interviews. Following the TSS, for the triangulation and validation of the quantitative results, semi-structured interviews were carried out by the researcher at the end of the study. The interviews were conducted individually with six randomly selected participants who agreed to be interviewed voluntarily. Face-to-face meetings were held in English and lasted for about 15 minutes. The interview questions (see Appendix C) aimed to gather more in-depth data by exploring the participants' beliefs and ideas about CLIL as well as their own sense of efficacy in terms of instructional strategies, classroom management, and student engagement. Some of the questions from the interview are as follows:

- Do you think you possess knowledge about CLIL and competencies for teaching through CLIL?
 - If yes, can you support your arguments with an example? If no, can you support your arguments with an example?
- Do you think you know about CLIL instructional strategies?
 If yes, can you support your arguments with an example?
 If no, can you support your arguments with an example?

• Do you think CLIL should play a stronger role in the Turkish ELT curriculum? Why

3.4.1.4 CLIL lesson plans. In order to address the third question of the present research, a group of 28 participants involved in the CLIL teacher training were asked to create in groups the CLIL lesson plans and present their plans in the class. Further, the lesson plans were collected and the content analysis was implemented to explore how Turkish EFL pre-service teachers reflect their understanding of CLIL in planning lessons. In order to clarify the lesson planning for the trainees and save their time while preparing the lesson plans, the researcher provided the participants with the common lesson plan template (see Appendix D). The trainees created and presented their lesson plans in group during the last CLIL training session. Consequently, they were asked questions and received feedback from the trainer as well as from their classmates.

3.4.2 Data collection procedures. After the purpose of the study was identified and necessary data collection instruments were selected and modified, the researcher contacted the administration of the target university personally and took permission from the Head of the English Language Teaching Department. Additionally, the researcher visited a professor who was working with the target group of students at that university during the spring semester in order to propose the research topic and receive her approval for investigation of the potential participants. After the nature and the purpose of the study as well as its methodology was clearly explained and discussed, a professor offering the course to the prospective research participants kindly agreed to participate in the research as she was also working on CLIL and allowed to provide her group as a sample for the present study and to collaborate with the researcher in providing CLIL teacher training to this class.

3.4.2.1 Pre-test and post-test procedure. As it was mentioned previously, the research started at the beginning of the Spring semester of 2018 and data collection procedure took 5 weeks in total.

In the first week of the study, after getting the permission from the heads of the department, the researcher visited the class which was taken by the research participants at that time. With the help of the course instructor, the researcher introduced herself to the group of participants, explained the nature and the purpose

of the research, as well as the conditions and requirements for the research procedure. Consequently, based on the ethical responsibility to safeguard the research participants, the students were informed about the confidentiality of their responses and, in confirmation of that, the students were provided with a letter of consent (see Appendix E) to learn and sign before the questionnaires were given to them. Thus, the participants were assured that all the information gathered during the study would be confidential and secured. Consequently, when 28 Turkish ELT students gave their consent to participate in pre- and post-tests, CLIL teacher training, and interviews, the pre-tests of TSS and The Attitude and Experiences in CLIL questionnaire were administered to the students by the end of the first class in the first week of the study.

After 4 weeks of the training, post-tests of TSS and Attitude questionnaire were completed by the same group of participants and consequently compared and contrasted with the pre-test data in order to see the impact of CLIL teacher training.

3.4.2.2 CLIL teacher training design and procedure. Keeping in view the main focus and the purpose of the present research study, an introductory CLIL teacher training programme was developed by the researcher through which a group of 28 Turkish ELT students was taught CLIL by the instructor through the number of methodologies and materials including PowerPoint slides, research articles, books, handouts and videos, presented in more detail below. The ELT students started being trained in the second week of the study and total period of training took 3 weeks. The instructor of the Language Acquisition course played a role of a teacher trainer and the researcher assisted the trainer and observed the class during the training process.

The content of the training programme consisted of theoretical and practical parts, which were given throughout three weeks (five hours in total) of the training course. The training was given in the form of face-to-face classroom meetings held once a week and each lasted for 1-2 hours. The concept of the present training course itself was developed on the basis of the scientific studies mentioned in the review of literature, mainly the studies on the development of CLIL teacher training programmes for pre-service and in-service teachers conducted by Banegas (2012), Hunt, Neofitou, and Redford (2009), or Novotna and Prochazkova (2013). All the reviewed studies shared a common idea about the design of CLIL teacher training

programme. The first part is theoretical which involves the history of CLIL, its definition, principles, strategies, and theoretical background. The second part, practical, was aimed to enable the trainees to develop CLIL lesson plans, to share and exchange the experience inside the classroom and get a feedback or evaluation. The detailed information about the content of the implemented CLIL teacher training is presented in Appendix F.

The first one-hour training session, carried out in the second week of the study after the pre-test data were collected, involved the introduction into the nature of CLIL, its aims, and principles. The class was trainer-centered and based on the description of the slides where all the information was presented (see Appendix G). The content of the first training lecture involved the introduction to CLIL, its history, aims, benefits, principles, and theoretical approach. The theoretical part of the training program was prepared by using various CLIL-related materials and resources (Coyle, 2005; Darn, 2015; Delicado Puerto & Pavon Vazquez, 2016; Marsh, Mehisto, Wolff, Martin, 2010; Marsh, 2002; Pokrivcakova et al., 2013; Ruiz de Zarobe & Jimenez Catalan, 2009; Wielander, 2013). At the beginning of the session, the student teachers were asked to discuss what they know about CLIL, what they remember from their previous courses about the CLIL approach. After that warm-up activity, the trainer started lecturing and the students mainly were listening to and making the notes. The main focus of the observer was to explore if the students follow the lecture and how they behave while listening. At the end of the session, the students watched a video where David Marsh shares his own experience in studying CLIL and its implementation in different countries, the future of CLIL and suggestion how to implement CLIL successfully.

The second training class started in the third week of the study and involved two sessions, one-hour lecture on the theory of CLIL and one-hour workshop on CLIL lesson planning. The first part of the session gave participants the deeper insight into the theoretical framework upon which any CLIL teaching should be based. Moreover, the trainees learned about the strategies and competencies necessary for creating and teaching CLIL lessons, the main features of CLIL teaching at primary, secondary, and higher educational level. The second session was more trainee-centered and held in the form of a workshop, where the students were administered the examples of CLIL lesson plans at different educational levels taken

from Broomhead (2014), Coyle (2005), Coyle, Hood, Marsh (2010), Pokrivcakova et al., (2013). While working in groups, the students had to study thoroughly the given lesson plans and analyze them according to the following set of questions prepared by the teacher trainer: How is the CLIL 4 Cs Framework realized? What are the objectives for each component of the framework? Do the objectives and content/tasks/activities/ match? What is your perspective on the lesson plans?

Then, the students presented the lesson plans they received in groups describing them and giving reflective analysis to the plans according to the given questions. Finally, the trainees exchanged the ideas about lesson planning, what would they add or exclude from those lesson plans, and their general overview and opinions towards planning CLIL lessons. The students were also given homework in groups which required the development of their own CLIL lesson plans for the grade and level of their own choice. In order to support the students, the trainer gave them one CLIL lesson plan template and additional resources upon which they could create their own institutional plans.

The third and the last CLIL teacher training session was carried out in the fourth week of the study and took two hours in total. At the beginning of the first part of the training session, the students had to revise the knowledge gained in the previous training classes. In order to assess what they remember about the theoretical framework of CLIL, they were given handouts with CLIL 4 Cs Framework mind map and completed the mind map in groups (see Appendix H). After working on the mind maps the students were allowed to present their own lesson plans which were prepared in groups as homework. Following the presentations of homework, the students had to reflect on their peers' work, give their feedback and general overview while the instructor also gave her feedback and further suggestions to each group of trainees.

3.4.2.3 Semi-structured interviews. After 5 weeks when the post-test data were collected, specific day and time were arranged for a face-to-face meeting for each of 6 students randomly selected to participate in the interviews. Each semi-structured interview was conducted in English and involved 6 questions presented in Appendix C while the additional questions were asked when needed to elicit further details. Informed consent for the tape recording and transcription of the responses during the

interviews was provided by the entire participants. The interviews lasted between 30 to 40 minutes starting with self-introductions, and then following questions and subquestions appeared during the face-to-face talk. The interviews were conducted in a friendly atmosphere so that the interviewees could give open and sincere answers about their views on CLIL and beliefs about their self-efficacy in teaching.

3.4.3 Data analysis procedures. In order to analyze the quantitative data, a statistical software called 'SPSS' was employed by the researcher. First, the descriptive statistics were used to get the means and standard deviations of the scores from both pre- and post-tests of TSS and Attitude and Experiences in CLIL questionnaire. Following this, the means were compared and contrasted with the use of inferential statistics, mainly, Paired-Samples T-test, to find out if there is a statistically significant difference between the means of the pre- and post-data. Moreover, this analysis enabled the researcher to learn if the results were strong enough to support the assumption about the effectiveness of CLIL teacher training programme in terms of pre-service teachers' self-efficacy beliefs.

The analysis of qualitative data gained from the semi-structured interviews and CLIL lesson plans submitted by the trainees was employed by content analysis procedure. Krippendorf (1989) defined content analysis as one of the most important research techniques for describing the textual data by retrieving the information solid and relevant to the context of the study. According to the author, the content analysis procedure involves three main steps such as sampling, coding, and drawing inferences.

Sampling stage of data analysis in the present study was aimed to identify the data source to be analysed. Further, a process of coding the interview data and establishing the categories and sub-categories was based on the concepts addressed in the TSS (instructional strategies, classroom management, and student engagement). After transcribing the interviews, the researcher read through the transcripts several times to find relevant or interesting information appeared in the text. Then, the open coding helped to identify related items while the axial coding enabled to combine those items into general groups. The content analysis of CLIL lesson plans was produced under the framework reflected in the studies on CLIL

lesson planning methodologies of Coyle (2005) and Banegas (2015). A summary of the research questions and the corresponding information is presented in Table 1.

Table 1

Overview of data analysis procedure

Research Questions	N	Data Collection Instrument	Data Analysis	
1. Does CLIL teacher training have an effect on Turkish EFL pre-service teachers' self-efficacy beliefs?	28	TSS Pre- and Post-test, Semi-structured Interviews	Descriptive, Inferential statistical analysis, content analysis	
2. What are the attitudes of Turkish EFL preservice teachers towards CLIL?	22	Attitudes and Experiences in CLIL Post-test, Semi-structured Interviews	Descriptive statistical analysis, content analysis	
3. How do Turkish EFL pre-service teachers reflect their CLIL understanding in planning CLIL-based lessons?	28	Lesson Plans	Content analysis	

3.4.4 Reliability and validity. In order to get adequate and credible results of the study, it is important to measure reliability and validity of the research instruments, data, and outcomes (Creswell & Miller, 2010), considering the quantitative part of the study. Thanasegaran (2009) defined a reliable instrument as being non-error-prone and bringing consistent results. The author further identified validity as an extent to which the results are obtained only due to the measurement and are not affected by any unrelated factors. The factor analysis carried out by Tschannen-Moran and Hoy (2001) indicated that the TSS is sufficiently valid and reliable to measure self-efficacy beliefs of the respondents. The reliability of all three dimensions of the scale was estimated as 0.94. In order to measure the construct validity of the scale, the correlations between present scale and other two teacher efficacy scales were investigated and demonstrated meaningful inferences and had positive consequences (r = 0.18, 0.53, p < 0.01; r = 0.64, p < 0.01; r = 0.16, p < 0.01).

3.4.5 Trustworthiness. Throughout the process of data collection and analysis it is necessary to ensure that the results and interpretations of the qualitative part of the study. Guba (1981) identifies four strategies to address the trustworthiness of the study: credibility, transferability, dependability, and conformability (as cited in Shenton, 2004, p. 64).

In terms of credibility, the present study utilized relevant interview questions, involved randomly assigned interviewees, and the methods of content analysis were derived from the previous comparable studies. Moreover, the researcher employed various data sources to maintain the data triangulation. Transferability refers to the generalization of the research findings. However, it is not always possible to transfer the results to the other situations beyond the context of the given study. Therefore, the present study provides clear and detailed information about the context and participants of the study so that the readers can determine to what extent they can generalize that information. Dependability, according to the author, stands for the reliability of the study. In order to address the reliability of the qualitative results, the researcher described the process of the study in detail. Finally, to address the conformability of the qualitative results, the participants had an opportunity to check their responses to ensure the objectivity of the researcher.

3.5 Limitations

The present research has a number of limitations which were mostly out of control due to some determining factors. These limitations are as follows: time of data collection limited to one semester; small sample size of the research limited to 28 participants; setting of the study limited to one particular university; data collected only from the students' perspectives; absence of a control group in the research what might cause possible threats to the validity of the results;

Therefore, the primary goal of the research was not to generalize the outcomes but gain deeper insights into the perspectives and beliefs of Turkish EFL pre-service teachers about CLIL and teaching in general before and after the implementation of CLIL teacher training course. Due to the limitations of this study mentioned above, it is important to conduct further research in the field of CLIL within Turkish EFL context in wider setting and with a bigger sample size so that the opportunity to generalize the results will raise. Moreover, it is necessary to raise further the

awareness about the development of CLIL teacher training programmes for preservice teachers in Turkish EFL context.

Chapter Four

Findings

4.1 Overview

In this chapter, the results related to the effect of CLIL teacher training on Turkish EFL pre-service teachers' self-efficacy beliefs, their attitudes towards CLIL, and the reflections of their CLIL understanding in planning lessons are presented. The data were collected from one single group of 28 ELT students from one private university in Istanbul. As it was mentioned previously, the research instruments involved TSS, Attitude and Experiences in CLIL questionnaire, semi-structured interviews, and lesson plans. The quantitative and qualitative results are presented according to each question addressed in the present research.

4.2 Results on the Turkish EFL Pre-Service Teachers' Self-Efficacy Beliefs

The aim of the quantitative analysis of the data gathered by the TSS was to find out if there is an effect of the CLIL pre-service teacher training course taught to the group of Turkish EFL pre-service teachers on their self-efficacy beliefs. The researcher's basic assumption in this study was that there will be the statistically significant difference between the means of pre- and post-test scores so that the implementation of the CLIL teacher training has an effect on the participants' teacher self-efficacy beliefs. The level of significance in this research was defined as $\alpha = 0.05$ (Huck, 2012). After the data from both tests were gathered, the researcher used SPSS to produce descriptive analysis and paired-samples t-test (inferential) types of statistical analysis in order to find the means and standard deviations of the scores gained by the participants in pre- and post-tests and, further, to identify if there is a statistically significant difference between the means of pre- and post-test scores.

Before the descriptive and inferential analysis was produced, the means of pretest and post-test self-efficacy scores were tested for normal distribution in order for the results to be reliable (Huck, 2012). According to the Shapiro-Wilk normality test, the p-value of pre-test results is equal to 0.731 while the p-value of post-test results is equal to 0.515. Thus, as both of the p calculated values are more than p critical value

 $(\alpha=0.05)$, it can be concluded that the data scores are normally distributed. Further, SPSS was used to produce a descriptive analysis of the data. For this research, the descriptive analysis was employed to find the means and standard deviations (SD) of the scores for each of 24 items obtained in pre- and post-test of TSS. Consequently, the normally distributed data from the output of the descriptive analysis enabled the researcher to produce the dependent (paired-samples) t-test to compare the means of two dependent variables of the same sample size (pre- and post-tests on teacher self-efficacy beliefs before and after the CLIL teacher training) and to detect a statistically significant difference between those means.

The dependent t-test analysis revealed the overall M and SD of both groups of scores. Thus, the overall mean of scores in post-test is higher (M = 7.0725, SD = 0.312) than the average of a set of scores in pre-test (M = 6.5708, SD = 0.361). In order to define if the average difference between two variables is statistically significant the researcher referred to the last table in the SPSS output. The information in Table 2 presents the main values of the paired-samples analysis such as t-value, degrees of freedom (df), and significance level (Sig.) which enable to detect the statistical significance of the difference between variables.

Table 2

Paired Samples T-Test Results for TSS data

		Paired Differences		_			
		M	SD	N	t	df	Sig.
Teacher Self-	Posttest						
Efficacy	Pretest	0.50167	0.17812	28	13.798	23	*000
beliefs							

^{* &}lt; 0.05

The results presented in Table 2 indicated that the means of two groups of variables (pre-test and post-test scores) are statistically different. The dependent samples t-test was associated with a statistically significant effect (Huck, 2012), t(23) = 13.79, 95% CIs [0.42, 0.57], p < .05. As the t-test revealed that the mean of the post-test scores is greater (M = 7.0725) than the mean of those from pre-test (M = 6.5708), it can be concluded that the participants' self-efficacy beliefs in teaching raised significantly after they went through the CLIL teacher training course. Besides finding the statistical significance of the difference between two

means, it is important to detect the effect size of the results as well (Huck, 2012). According to the author, estimating the effect size allows the researcher to find out the practical significance of the difference what demonstrates that the difference is truly meaningful and to what extent it is significant (if the effect is large, moderate, or small). The effect size of the present results was found by estimating Cohen's d value via the online calculator. Thus, the effect size in the present research is d = 1.48 and considered as a large effect (Cohen, 1992).

Turkish ELT students were interviewed after they completed the scales and presented their lesson plans. The audio-recorded data elicited through the semi-structured interviews were first transcribed, then, analyzed through the content analysis, and relevant categories were found out and described within the general themes. These themes were related to the teacher self-efficacy dimensions in terms of general teaching practice and CLIL teaching as well which were addressed in the scale: instructional categories, classroom management, and student engagement.

Relating to the first theme which is about the Turkish EFL pre-service teachers' beliefs about their knowledge and capabilities in terms of instructional strategies they use generally in teaching and in CLIL-based instruction as well, the third question 'Do you think you have enough knowledge about CLIL instructional strategies? If yes/no, can you support your arguments with an example?' was addressed during the semi-structured interview. For this question, all 5 students (S1, S2, S3, S4, and S5) participated in the interviews expressed their raised self-efficacy beliefs about using CLIL strategies in their future teaching practice. The following statements illustrate the student teachers' sense of efficacy in using CLIL instructional strategies after the CLIL teacher training course:

- [...] In terms of teaching content, with the help of a subject teacher, I think I would be able to use CLIL instructional strategies in my teaching (S3, 06.04.2018).
- [...] I think I have enough knowledge about CLIL instructional strategies from our Language Acquisition course (S4, 07.04.2018).

The most frequent examples of CLIL instructional strategies shared by the respondents were rich input, authentic materials, scaffolding, real-life situations,

activating higher order thinking skills, collaborative work, 4Cs instruction, relevant content, differentiated methods, and student-centered instruction.

The responses to the fourth question 'Do you think you are competent in managing CLIL classroom? If yes/no, can you support your arguments with an example?' were analyzed and categorized according to the second theme related to the participants' self-efficacy beliefs about CLIL classroom management. Considering this question, 3 out of 5 students reported that they are not confident in their abilities to manage the classroom as they have no teaching experience. To illustrate the participants lower sense of efficacy in managing CLIL classroom:

- [...] I don't' think I am competent enough in terms of managing the classroom as I'm not an experienced teacher (S3, 06.04.2018).
- [...] I am not professional in managing CLIL classroom as I don't have enough teaching experience (S4, 07.04.2018).
- [...] I don't have the competencies in managing EFL classroom as I'm only a second-year student but if I had an opportunity I would definitely teach by CLIL (S5, 11.04.2018).

The results mentioned above indicated that despite the theoretical knowledge the students received during the training sessions, they still have lack of confidence in teaching practice as they are not professional teachers. However, the other respondents mentioned some techniques to manage the classroom which they would experience in their future practice:

- [...] The teacher should assist the students and use the scaffolding technique (S1, 04.04.2018).
- [...] To get the students' attention the topic is very important so that the teacher should choose the relevant topic, which is not boring, which is different (S2, 04.04.2018).
- [...] For the higher leveled students managing the CLIL classroom would be easier; For instance, I would manage the disruptive students by some warm-up activities, group activities, competitions, collaborative works (\$3, 06.04.2018).

From this, it becomes clear that the respondents related the instructional strategies they learned during the CLIL training to the classroom management techniques.

The third theme related to the pre-service teachers' self-efficacy beliefs about their abilities to engage the students in their lessons was addressed in the fifth question which is 'How can you enhance student engagement in CLIL classroom?'. This question received mostly positive views from the participants as all of them shared the specific examples of how to engage the EFL students which were categorized as follows: group-work, collaborative learning, peer-feedback, games, realistic situations, problem-solving tasks, interactive instruction, secure classroom environment. Some of the responses illustrating the pre-service teachers' self-efficacy beliefs about engaging their students' in CLIL lessons are presented below:

- [...] To engage the students you should make the lessons more interactive (S1, 04.04.2018).
- [...] I would incorporate the activities related to the students' real life so that they will be more willing to share with their peers and teacher (S2, 04.04.2018).
- [...] I would enable my students to compare their culture with other cultures, to discover the different cultures (S3, 06.04.2018).

From the answers reported above it became clear that the students were more confident in their capabilities to engage their potential students in lessons as they demonstrated the knowledge, they received previously in their study as well as the information they acquired during the CLIL teacher training. In addition, the participants interconnected the instructional strategies with the methods needed for the classroom management and student engagement.

Overall, an analysis of the responses received from the semi-structured interviews indicated the current sense of efficacy of Turkish EFL pre-service teachers in terms of instructional strategies, classroom management, and student engagement. The results demonstrated the participants' raised confidence in using the instructional strategies and methods for the student engagement whereas their self-efficacy beliefs about classroom management are still negative due to the lack of

teaching experience. Finally, the answers retrieved from the interviews demonstrated that the CLIL teacher training in which the participants were enrolled had a positive effect on the beliefs about their own abilities and competencies in two out of three categories of teaching mentioned previously.

4.3 Results on the Turkish EFL Pre-Service Teachers' Attitudes towards CLIL

In the present study, SPSS was used to produce a descriptive analysis of the normally distributed data obtained from the Attitude and Experiences in CLIL questionnaire. The descriptive analysis enabled to find the means (M) and standard deviations (SD) of the scores for each of 17 items of the questionnaire (see Table 3).

Table 3

Descriptive statistics for Attitude and Experiences in CLIL data (n=28)

Items	M	SD
1. I would like to know more about CLIL.	4,14	1,044
2. I would like to be given the opportunity to teach	4,11	1,100
subject content (Mathematics, Science, Art, Music,		
Geography, Literature, Social Studies) through		
English.		
3. My experience in teaching subject content through	3,79	1,101
English has been positive.		
4. CLIL benefits students.	4,61	,497
5. CLIL helps students develop only their lang. skills.	1,29	,460
6. CLIL helps students develop only their subject	1,29	,460
knowledge.		
7. CLIL helps students develop both their language	4,68	,670
skills and subject knowledge.		
8. CLIL requires more methodology knowledge than	3,96	,838
ELT teachers possess.		
9. CLIL requires more subject knowledge than	4,18	,772
teachers ELT teachers possess.		
10. CLIL requires a lot of time (both lesson planning	4,43	,690
and teaching).		
11. CLIL requires new teaching materials.	4,39	,685
12. CLIL requires a lot of administrative support.	4,39	,497
13. CLIL requires cooperation with subject teachers.	4,46	,838
14. CLIL is only possible with intermediate students of	1,64	,989
English.		
15. CLIL is only possible with young learners.	1,64	,989
16. CLIL only possible with older students.	1,46	,838
17. I would be interested in future CLIL projects.	3,93	1,052

To start with, as it is seen from the Table 3, the highest mean score of the responses was found for the item 7 (M = 4,68, SD = 0,670). This can be interpreted that the participants had a clear about the main aim of CLIL – its ability to teach both the language and the content of the subject simultaneously However, the two other items, (item 5 and item 6), which are opposite to the item 7 got the lowest mean score (M = 1,29) what demonstrated the respondents' negative attitude to the claim that CLIL helps learners to develop only the language or only the content respectively. Further, item 14 (M = 1,64), 15 (M = 1,64), and 16 (M = 1,46) assumed that CLIL teaching is possible only with intermediate, young, or older learners demonstrated the lowest average mean rank. This means that the students strongly believed that CLIL is possible with any educational level of the learners. The next higher average mean belongs to the item 4 (M = 4,61) which claims that CLIL is beneficial for the students. This result demonstrated that the majority of the participants strongly agreed with the statement. The other set of items turned out to have also high mean scores (items 9, 10, 11, 12, 13) claiming that CLIL requires more subject knowledge, more time, more new teaching materials, and greater support from the administration. From this, it can be concluded that the participants all shared the right view that CLIL is a complex approach which requires more efforts than the usual EFL lessons. Finally, according to the results from the item 1 (M = 4.14) and item 17 (M = 3.93), the majority of the students had positive view about CLIL in terms of wishing to get more knowledge about it and the interest in the future studies on CLIL.

From the descriptive analysis of the quantitative results obtained by the Attitude questionnaires, the general picture represents a positive attitude towards CLIL expressed by the majority of the respondents. Moreover, positively high results were indicated for the questions about the beneficial nature of the CLIL approach, its influence on the learners' language as well subject matter development. The students shared a moderately positive attitude towards participating in the future research in the fields of CLIL. Finally, the results revealed that the participants generally had a clear idea about the aim and the characteristics of CLIL teaching methodology.

In order to gain more clear insight into the attitudes of Turkish EFL pre-service teachers towards CLIL approach and to triangulate the quantitative results of this research reported previously, three questions were addressed during the semistructured interviews conducted with 5 randomly selected participants. The content analysis of the interviews was produced according to the aims of each interview question and categorized into three aspects of the participants' attitudes: their understanding of the term CLIL, competencies they gained to teach through CLIL, and their attitude towards the role of CLIL in Turkish EFL curriculum.

To start with the first category addressed in the first interview question, 'How do you understand the term 'CLIL'?', all 5 participants shared a clear understanding of the meaning of the term CLIL and its main aim which is to teach a subject in a foreign language through integrating content and language simultaneously. The following answers are presented to illustrate the students' comprehension of the term CLIL:

- [...] I think that CLIL is about content and language integrated learning and it's a good method because its' not only about focusing on grammar or on content but also on general knowledge about the world, the culture (S3, 06.04.2018).
- [...] CLIL means content and language integrated learning, teaching subjects to students in a language that is not their own. I think CLIL has a really good effect on students as it provides a long-term learning (S4, 07.04.2018).
- [...] I understand it as teaching the content (Geography or History) hand in hand with the language, but it depends on the aims of the curriculum or a teacher to focus more on the content or on the language (S5, 11.04.2018).

As a result, the students demonstrated that besides their clear understanding of the meaning of CLIL and its main aim, they are able to distinguish why CLIL is beneficial than the other teaching approaches.

The next category addressed in the second question which is 'Do you think you possess some extent of knowledge about CLIL and competencies for teaching through CLIL?' also reflected in positive perceptions of all 5 respondents. The trainees shared common agreements that they received enough knowledge about CLIL in general from their previous learning experience or from the CLIL teacher training given to them within their Language Acquisition course. To support this analysis, some of the responses are presented as follows:

- [...] Yes, I think that I know now at least the main basic knowledge about CLIL. For the example, with CLIL teaching method you can use a content to teach a foreign language, or you can use a language to teach the content; It's two different ways, you can use both of them (S2, 04.04.2018).
- [...] I think I definitely possess the main information about CLIL as last year I received some background knowledge on CLIL, and this year, with your training I got more information on CLIL; and maybe I will use it in my future teaching practice, especially it would be really appropriate for intermediate and advanced learners (S3, 06.04.2018).
- [...] I have some basic knowledge about CLIL, its aims, principles, and strategies from our training classes, HOTs, integrating culture, teach the language in a communicative way (S5, 11.04.2018).

The last category related to the attitudes of Turkish EFL pre-service teachers towards the role of CLIL in Turkish EFL curriculum was addressed in the question 6 which is 'Do you think CLIL should play a stronger role in the Turkish ELT curriculum?'. The analysis revealed that all the respondents had a generally positive attitude towards incorporating CLIL in the Turkish EFL curriculum. Further, the students referred to their own learning experience stating that, currently, EFL lessons at schools have still drawbacks which could be eliminated by integrating CLIL. The most frequent reasons for the students' weak EFL output mentioned in the interviews are grammar-focused instruction, 'boring' topics; focus only on the lower order thinking skills, insufficient teacher preparation. Moreover, the respondents provided their personal suggestions for the incorporating CLIL into the Turkish EFL context:

- [...] CLIL should play a really strong role in the Turkish EFL curriculum; the administration of the schools should consider it as a very important approach (S1, 04.04.2018).
- [...] teachers should be well prepared and more teacher trainings on CLIL should be provided before they start teaching (S2, 04.04.2018).

Hence, from the results presented above it can be concluded that the attitudes of Turkish EFL pre-service teachers towards integrating CLIL into the Turkish EFL curriculum are generally positive. Further, the respondents provided their arguments

why CLIL will play a beneficial role in the Turkish EFL context mentioning the gaps existing in Turkish EFL lessons nowadays. Finally, the students demonstrated that they have awareness about the demands of CLIL-based instruction and the conditions under which CLIL can be incorporated into the schools' curriculum.

To conclude, the results driven from the semi-structured interviews showed that Turkish EFL pre-service teachers had generally positive attitudes towards such aspects like understanding of CLIL as a term, knowledge about CLIL and acquired competencies to teach through CLIL, and finally, the role CLIL needs to play in Turkish EFL curriculum. Moreover, besides knowing the advantages of CLIL among the other teaching approaches and its potential efficacy in Turkish EFL lessons, the participants demonstrated that they clearly realize the difficulties and demands which CLIL teachers might encounter. Further, the respondents expressed their suggestions for the education stakeholders to support the integration of CLIL and to prepare the teachers sufficiently before they enter their CLIL teaching practice.

4.4 Results on the Turkish EFL Pre-Service Teachers' reflections of CLIL understanding in planning lessons

Following the theoretical framework of CLIL lesson planning offered by Coyle (2005) and Banegas (2015), the content of the lesson plans was analyzed and described according to the following categories: grade and level; duration and structure; lesson objectives; CLIL component (content, cognition, communication, and culture); activities.

To start with, in total 12 lesson plans were created and presented by the trainees in groups after they received CLIL teacher training. Regarding the grade and level targeted in the lesson plans, the participants covered different learners' ages and levels: 3 lesson plans for pre-intermediate and intermediate levels (grade 4), 3 lesson plans for elementary, B1 and A2 levels (grade 8), 2 lesson plans for the 10th graders, 2 lesson plans for elementary and B1 levels (grade 6), 1 lesson plan for the B1 level (grade 5), and 1 lesson plan for the beginner level (grade 1). As for the lesson duration, the majority of lesson plans targeted at 40-minute lessons whereas 3 lessons – 45 minutes, 1 lesson – 80 minutes (2 sessions).

In general, all 12 lesson plans followed the lesson plan structure presented as follows:

- 1. Warm-up stage
- 2. Presentation and practice
- 3. Production
- 4. Follow-up stage
- 5. Evaluation

Among the lesson objectives described in each of 12 lesson plans, the following examples can be mentioned:

- to categorize specific types of the content;
- to analyze a text by highlighting the main information;
- to calculate:
- to identify the body parts;
- to create a scenario;
- to develop vocabulary and oral skills;
- to act out a given scene;
- to evaluate and compare the classification of animals;
- to organize the planets according to temperature, color, surface;
- to understand the facts, events, causes of the First World War;
- to compare and contrast differences between two cultures;
- to write about Viking personas and lifestyle;
- to differentiate the 'Simple Present Tense' in the text;
- to be able to name different sports individuals and teams.

The lesson plans included a CLIL component which involves such aspects as content, cognition, communications, and culture. The content analysis of this part of the lesson plans revealed that the trainees developed their lesson plans in various ways and focused on different components of the lesson. To illustrate how the Turkish EFL pre-service teachers reflected their CLIL understanding in planning their potential lessons, Table 4 presents the main examples of 4 Cs framework categories such as content, cognition, and culture retrieved from the content analysis of those lesson plans.

As a result, the content part of the lesson plans implied the subject chosen by each group of the trainees to teach in their potential lessons.

Table 4

CLIL component of the lesson plans (3 Cs)

Content	Cognition (to be able to)	Culture		
		(gaining intercultural		
		awareness)		
Art (Music &	to define music and dance	about societies having		
Dance)	types according to the	different music and dances		
	different cultural preferences;	preferences;		
Biology (Animals)	to identify how many classes	about the dangers of the		
	of animals there are;	extinction of animals;		
History	to compare the learners' own	about difficulties which		
	lifestyle to the Viking	people faced to during the		
	personas they created;	wars;		
Culture (Holidays)		about the national holidays;		
EFL (Food &	to be able to make orders;	about the foods of different		
Drinks)		cultures;		
EFL (Space)	to organize the planets	about the space and planets		
	according to the temperature, beyond the earth;			
	color, surface;			

The aspect of cognition was reflected in the students' lesson plans as a CLIL component challenging learners to build their own understanding during the learning process and developing learners' higher order thinking skills, whereas the cultural aspect was presented as a part of the CLIL lesson aimed at raising the learners' awareness and tolerance towards the multicultural and cosmopolitan world around.

The category of communication of the CLIL component implemented by the participants' in their lesson plans contained four subcategories such as vocabulary, structure, functions, and skills. The structure of the communication part was retrieved by the researcher from the CLIL textbook by Broomhead (2014) used as a material in the training sessions. Further, this part was clearly presented and explained in the lesson plan template that was provided to the trainees beforehand. Further, some examples of the communication part of the lesson are presented in Table 5.

Table 5

CLIL component of the lesson plans (Communication)

Vocabulary	Structure	Functions	Skills
Universe,	Comparatives/superlatives;	Talking about	Description,
distance		past events;	scanning,
Invertebrates,	Present Simple Tense (do,	Expressing the	Listening for
vertebrates	does, don't, doesn't)	sum;	the details;
Military Ranks	Past Simple Tense, cause, and effect	Giving orders;	Presenting menu in dialogues;
Lunar New Year	Ordinal/nominal numbers	Describing a daily routine;	Expressing own ideas;
Alliance system	Passive Voice	Expressing the main features;	Giving examples;
Invader, brutal, hunt	Action verbs, conjunctions	Matching the names with the related answers;	Predicting
Cold-	Adverbs of time and		
blooded/warm- blooded	frequency		

The last part of the content analysis of the trainees' CLIL lesson plans is concerned with the activities implemented in their potential CLIL-based lessons. Thus, on average, the students involved between 3 and 4 activities in their lesson plans. The activities related to the content as well as to the language learning whereas some lesson plans contained the activities which were aimed at the content and lesson plans at the same time. According to the Banegas (2015), the researcher considered the content-related activities as those aimed to engage the learners with content through different language and cognitive tasks. On the other hand, the language activities were related to those included grammar or lexis learning. To illustrate which activities the trainees decided to implement in their CLIL-based lesson plans, Table 6 represents the examples of some content and language activities retrieved from the reviewed lesson plans.

Table 6

Activities in the CLIL lesson plans

Content activities	Language activities
Matching the events and the vocabulary.	Writing a short summary of the war (Past Tense).
Yes/No questions by scanning the text.	Describe yourself as an animal (masks)

Table 6 (Cont.d)

One student explains a sport by body language and facial expression; the other students guess the sport.

interrogative sentences by using the verbs and sports names on the board.

The students read the menu and make an order; then, they calculate the orders.

Exercise on grammar (articles, countable/uncountable).

Creating positive, negative,

Warm-up activity – test about the Space.

Watching a video and guess which grammar structures were used.

The analysis of the activities implemented in the CLIL lesson plans demonstrated the students' understanding of the CLIL principle regarding the balanced focus on the content and language learning through different activities. The activities tended to be sequenced from the simple to more complex involving higher order thinking skills development (evaluating the causes of the war battle, creating a Viking persona Facebook profile and compare their lifestyle to the student's own, analyzing the differences existing in the cultural preferences in dance and music).

To conclude, the paired samples t-test analysis of the data from pre- and posttest of the TSS demonstrated that there is a statistically significant effect of the CLIL teacher training on the Turkish EFL pre-service teachers' self-efficacy beliefs in terms of instructional strategies, classroom management, and student engagement.

The results gained from the interviews revealed the positive influence of the CLIL teacher training on the participants as they demonstrated their knowledge of the instructional strategies needed for the CLIL lessons and the strategies for student engagement which they acquired in their previews learning experience as well as during the CLIL teacher training they were enrolled. Among the instructional strategies, the majority of Turkish ELT students mentioned there are rich input, authentic materials, scaffolding, real-life situations, activating higher order thinking skills, collaborative work, 4Cs instruction, relevant content, differentiated methods, and student-centered instruction. On the other hand, the participants demonstrated the lower self-efficacy beliefs regarding their abilities to manage the classroom what was explained by the lack of the participants' experience in teaching.

The results received from the Attitudes and Experiences in CLIL questionnaires showed generally positive attitudes of the Turkish EFL pre-service

teachers' towards CLIL approach. The participants demonstrated their knowledge and understanding of the CLIL term, its aims, and principles. The results also indicated the students' agreements that CLIL is beneficial and possible with any educational level of learners. Furthermore, the results indicated that the students' are aware of CLIL as a more complex approach demanding more efforts to work with, more time, and more teaching material to involve. The participants shared their positive perceptions on knowing more about CLIL and their positive attitude to participate in future studies on CLIL.

Finally, the results driven from the interviews indicated that the majority of participants agree that CLIL should play a stronger role in Turkish EFL curriculum as it will have a positive effect on the learners' achievements. Additionally, the respondents noted that the school administrations and stakeholders should support the CLIL teachers and foster the implementation of CLIL in Turkish educational context.

The analysis of CLIL lesson plans submitted by the research participants demonstrated the overall results on how the Turkish EFL pre-service teachers reflect their understanding of CLIL in planning lessons. Thus, the participants covered a variety of subjects such as History, Art, Biology, Sports, and EFL by implementing the CLIL component in their lesson plans. The students demonstrated their knowledge about the principles of planning CLIL-based lessons by focusing both on content and language, involving higher order thinking skills development, differentiated instruction, and various activities from simple to more complex. Finally, needless to say, the participants clearly distinguished in their lesson plans the subcategories of the communication part of the CLIL 4 Cs framework by involving teaching vocabulary, grammar or lexis structure, functions, and cultural component. The following chapter further discusses the results described in this chapter.

Chapter Five

Discussion and Conclusions

5.1 Overview

This chapter will present the discussion of the results regarding the effect of CLIL teacher training on Turkish EFL pre-service teachers' self-efficacy beliefs, their attitudes towards CLIL, and the reflections of their CLIL understanding in planning lessons. Further, conclusion and recommendations for future research will be addressed.

5.2 Discussion of Results for Research Questions

The present study had three main purposes. The first purpose of the study was to investigate the effect of the introductory CLIL-based teacher training on Turkish EFL pre-service teachers' self-efficacy beliefs before and after they were exposed to the training implementation. For this purpose, the reseracher utilized pre-test as well as post-test of the TSS administered to the same group of EFL students. Additionally, semi-structured interviews were conducted with randomly selected participants after the training implementation. The second purpose was related to the exploring of attitudes of Turkish EFL pre-service teachers towards CLIL approach. The data were elicited from the Attitudes and Experiences in CLIL questionnare as well as from the semi-structured interview questions. Finally, the research was aimed to investigate the reflections of Turkish EFL pre-service teachers regarding their CLIL understanding in planning lessons. To do so, the participants working in groups created and presented their own CLIL lesson plans in the final training session. Further, the results for each of three research questions (RQ) will be discussed.

5.2.1 Discussion of results for the RQ 1: Does CLIL teacher training have an effect on Turkish EFL pre-service teachers' self-efficacy beliefs? The present study resulted in the statistically significant difference between the means of Turkish EFL pre-service teachers' self-efficacy beliefs (p < 0.5) in pre- and post-tests. From this, it can be concluded that the implementation of the introductory CLIL teacher training facilitated the participants' raised sense of self-efficacy beliefs. However,

due to the threat of some limitations in this research mentioned previously such like non-random sampling, small sample size, one-group testing, and short training period, it is necessary to conduct further research on this topic cinsiderning those limitations.

In order to triangulate the quantitative data and provide further insight into the Turkish EFL pre-service teachers' self-efficacy beliefs about their abilities and competencies in terms of instructional strategies, classroom management, and student engagment, semi-structured face-to-face interviews with five randomly selected from the research sample students were carried out. The responses indicated that CLIL training gave teachers more knowledge about instructional strategies in teaching so that their confidence in this area raised after the training. Among the instructional strategies needed for CLIL-based teaching there were mentioned rich input, authentic materials, scaffolding, real-life situations, activating higher order thinking skills, collaborative work, 4Cs instruction, relevant content, differentiated methods, and student-centered instruction. Further, the participants demonstrated their stable level of confidence in terms of student engagement and following categories of frequently mentioned strategies were retrieved from the responses: group-works, collaborative learning, peer-feedback, games, realistic situations, problem-solving tasks, interactive instruction, secure classroom environment. These answers reflect the participants' high sense of self-efficacy regarding the instructional strategies and strategies for student engagement CLIL approach requires. Moreover, from these responses it can be concluded that the students' acquired the content from CLIL teacher training they went through related to the definition, aims, and strategies of CLIL approach. However, Turkish EFL pre-service teachers' sense of efficacy in classroom management turned out to be relatively low, and the main reason mentioned by all the respondents is the lack of teaching experience.

Comparison of the findings on teacher self-efficacy beliefs in the present study with the results in De Mesmaeker and Lochtman (2014) and Yessenova (2017) shows different outcome as these studies resulted in teachers' low level of self-efficacy beliefs in general aspects of teaching, in teachers' abilities in student engagement and motivation. On the other hand, similarly to our findings, the study by Chansri and Wasanasomsithi (2016) revealed the statistically significant effect of

CLIL course on the students' academic achievements as well as their raised content and language knowledge.

5.2.2 Discussion of results for the RQ 2: What are the attitudes of Turkish EFL preservice teachers towards CLIL? In order to explore Turkish EFL preservice teachers' attititudes towards CLIL as a new educational approach, the Attitudes and Experineces on CLIL questionaire was administered to the participants after they finished training programme. Moreover, specific questions from the semi-structured intreviews were addressed to gain deeper insight into their views about CLIL and its role in Turkish EFL curriculum.

The overall findings from questionanure and intreviews demonstarted that Turkish EFL pre-service teachers had pisitive attitudes towards CLIL. The participants agreed that CLIL helps to develop both content and language knowledge. Furthemore, the students shared their positive views about CLIL's beneficial influence on learners. On the other hand, the results showed the trainees' clear understanding that CLIL requires more time, teacher efforts, collaboration between colleagues, administrative support, and more teaching materials. The trainees also strongly disagreed that CLIL is suitable only for one specific educational level of learners stating that it is possible with any level and age of the students. Finally, more than half of the respondents expressed that they would particapte in future research on CLIL.

As regards the participants' attitudes towards the role of CLIL in Turkish EFL curriculum, all the interviewees shared their positive views on the CLIL implementation in Turkish education. They stated that CLIL would bring positive outcomes in Turkish students' academic achievemnets and personal development. The data demostrated the participants' views that the recent Turkish EFL lessons have gaps such as grammar-focused instruction, 'boring' topics; focus only on the lower order thinking skills, and insufficient teacher preparation. Therefore, the respondents consequently suggested that the successful CLIL implementation depends on the stakeholders' support and teacher preparation since their pre-service teacher education, including teacher training programs on CLIL.

The findings appeared in the present study were consequently compared to the results from the reviewed literature. Thus, similarly to our research, Kewara and

Prabjandee (2018) revealed that Thai teachers had positive attitudes towards CLIL after they were given CLIL teacher development training. However, different to our research findings, those teachers didn't believe in the effectiveness of CLIL instruction within Thai educational context as CLIL requires more efforts and time to prepare lessons.

Overall, the findings from Dalton-Puffer, Huettner, Schindelegger, and Smit (2009), Bozdogan and Karlıdag (2013), Pokrivcakova et al. (2013), McDougald (2014), Soler, Gonzalez-Davies, and Inesta (2017), Kewara and Prabjandee (2018) similarly to our results, revealed teachers' and other stakeholders' positive attitudes towards CLIL, its influence on learners' language development, their view that teachers' need more effective preparation in terms of training on CLIL methodology and strategies, what is also similarly to the findings of the present research.

5.2.3 Discussion of results for the RQ 3: How do Turkish EFL pre-service teachers reflect their CLIL understanding in planning CLIL-based lessons? The third and the last question addressed in this study was aimed to investigate how Turkish EFL pre-service teachers reflect their undersanding of CLIL in planning lessons. Therefore, after the CLIL teacher training was given to the group of Turkish ELT students, they were given the task to create and present their own CLIL-oriented lesson plans in groups. Consquently, 12 lesson plans were collected by the reseracher and content analysis was produced under the CLIL lesson planning frameworks of Coyle (2005) and Banegas (2015).

To start with, comparison of the content and structure of the CLIL teacher training program created for the present research and the studies reviewed in the literature resulted in similarities of the training programs, although their aims were different in each study. Thus, the findings from Hunt, Neofitou, and Redford (2009), Hunt (2011), Banegas (2012), Novotna and Prochazkova (2013), Delicado Puerto and Pavon Vazquez (2016), De Santo and De Meo (2016), Kewara and Prabjandee (2018) despite the different aims of the implemented CLIL training programs, shared such common features with our research as the structure of the training programme containing theoretical part and practical, mainly creating lesson plans, and the trainees positive outcomes and attitudes to the training.

The findings retrieved from the lesson plans in the present research demonstrated that the trainees were sufficiently prepared and competent in creating qualitative lesson plans for various levels and grades of learners. Moreover, the student teachers are competent in setting the differentiated lesson objectives which are aimed not only at one part of the lesson (grammar or content) but covering all aspects of the EFL or subject lessons. Thus, the lesson objectives presented in our research lesson plans were aimed at developing language skills, content acquisition, lower and higher order thinking skills, general knowledge about the world's facts and events. These findings were compared and turned out to be similar to the results from Banegas (2015), where the aims in the lesson plans were analyzed and divided by the researcher into language, learning, and content aims. Additionally, comparison of the lesson plans in the present study with the study of Banegas (2015) showed similarities in the chosen subjects such as Geography, History, Biology, and Art.

The CLIL component based on Coyle's (2005) 4 Cs framework, Content, Cognition, Communication, and Culture, reflected the Turkish EFL pre-service teachers' understanding of CLIL in planning lessons. As a result, all 12 lesson plans involved CLIL 4 Cs framework clearly distinguishing the role of each C in lessons.

Thus, regarding the Content, the lesson plans presented the subject and the topic of the lesson. Under the Cognition the trainees understood the abilities of learners they should develop during the lesson fostering higher order thinking skills. For instance, following categories of cognition were retrieved from the analysis: to define music and dance types according to the different cultural preferences (comparison and analysis); to compare the learners' own lifestyle to the Viking personas they created (creativity); to organize the planets according to the temperature, color, surface. The aspect of Culture was reflected in the teaching aim to provide an awareness about societies having different music and dances preferences, about the dangers of the extinction of animals, about difficulties which people faced to during the wars, or about the space and planets beyond the earth. This way of reflection the culture in CLIL lesson plans suggest that the trainees had a clear understanding of the aim of Cultural dimension of 4 Cs framework as well as their ability to provide critical thinking development in their CLIL lessons. The last category of CLIL 4 Cs framework, Communication, was presented in the lesson

plans by following subcategories (Broomhead, 2014): vocabulary, structure, functions, and skills. The findings in each lesson plan turned out to be similar to those from Banegas (2015): the trainees involved active vocabulary in their lessons, including specific terms related to the content. As for the grammar structure, the most frequent examples are tenses, voices, comparative/superlative forms, and adverbs. Regarding the functions which learners were supposed to perform, the most frequent examples given in the lesson plans were talking about past events, expressing, ordering, describing, and matching. From this it became clear that the students reflected their clear understanding of how to implement the 4 Cs framework in their lesson plans distinguishing between the interdependent aspects of content, cognition, communication, and culture. They demonstrated their knowledge of how to integrate the grammar structures, functions and skills into their lessons in a systematic and relevant way.

It can be concluded from the lesson plans analysis that the trainees demonstrated their sufficient understanding of CLIL, its aims, principles, and strategies in planning lessons. Turkish EFL pre-service teachers are aware, to some extent, of how to implement the CLIL component into the lesson clearly differentiating between the dimensions of content, cognition, communication, and culture. It also can be concluded that Turkish EFL pre-service teachers participated in this research were affected by the training on CLIL as they demonstrated raised level of knowledge about CLIL in their lesson plans through incorporating rich input of the content, all components of CLIL instructional framework, differentiated aims and activities.

5.3 Conclusions

On the basis of the results obtained in this research there was presented an outline of the influence of CLIL-based introductory teacher training on Turkish EFL pre-service teachers' self-efficacy beliefs regarding such variables as instructional strategies, classroom management, and student engagement. Moreover, their attitudes towards CLIL as a new type of educational approach were also received after the training sessions. Finally, the research enabled to retrieve a picture of how Turkish ELT students reflect their understanding of CLIL in creating lesson plans.

The descriptive and inferential analysis of the quantitative data regarding the first question demonstrated that the implemented training on CLIL had an effect on the pre-service teachers' sense of efficacy as there was found a statistically significant difference (mean difference = 0.5067) between the pre- and post-test results where the post-test results turned out to be higher than those from the pre-test. The semi-structured interview responses demonstrated the raised level of the preservice teachers' self-efficacy beliefs about the instructional strategies and student engagement; while the level of confidence in classroom management abilities turned out to be lower what was explained mainly by the lack of the participants' teaching experience. The Turkish EFL pre-service teachers demonstrated their increased knowledge of the use of instructional strategies and techniques to engage the students in CLIL lessons after they received CLIL training. Thus, among the CLIL instructional strategies the most frequent answers were as follows: rich input, authentic materials, scaffolding, real-life situations, activating higher order thinking skills, collaborative work, 4Cs instruction, relevant content, differentiated methods, and student-centered instruction. As regards the strategies for student engagement, the participants frequently mentioned group-works, collaborative learning, peerfeedback, games, realistic situations, problem-solving tasks, interactive instruction, and secure classroom environment.

For the second question of the research dealing with the attitudes of participants towards CLIL approach, the data from the attitude questionnaire were descriptively analyzed. The analysis demonstrated the Turkish EFL pre-service teachers' generally positive attitudes towards the implementation of CLIL. Moreover, the participants expressed their positive views on the stronger role which CLIL should play in Turkish EFL context. They agreed that the recent EFL lessons in Turkish context have gaps in terms of the instruction, topics, degree of focus on grammar and content; thus, further they suggested that the implementation of CLIL will be beneficial for Turkish EFL students.

Finally, the content analysis of the collected lesson plans produced on the basis of the framework from Banegas (2015), enabled to obtain the reflections of Turkish EFL pre-service teachers' understanding of CLIL in planning lessons. Overall, the research participants demonstrated their competencies in creating qualitative lesson plans, setting lesson objectives and using relevant activities and materials. Moreover,

the participants reflected their clear understanding of CLIL 4 Cs framework consisting of such dimensions as content, cognition, communication, and culture. They demonstrated their abilities to distinguish the aims and principles of implementing each of those dimensions into their lesson plans. The analysis of activities presented in the lesson plans revealed that the participants were able to make balanced focus on content and language development of learners as well as activating their higher-order thinking skills.

To conclude, more attention should be given on the development of specific CLIL-based teacher training programs aimed, primarily, at pre-service teacher education in Turkish EFL context.

5.4 Pedagogical Implications

The results of this study have some pedagogical implications which are as follows. First and foremost, the introductory CLIL teacher training programme developed by the reseracher in this study might be further used by the instructors in developing their own training programmes on CLIL or in various EFL lessons. The ELT students as well as in-service subject teachers can be taught to the main CLIL principles and mehodologies observed in this study. Moreover, the CLIL lesson plans created by the trainees in this study migt be further implemented and, if necessary, modified, by EFL and other subject teachers in various educational levels.

The study also investigated the teachers' self-efficacy beliefs and their attitudes towards CLIL. Therefore, it may give ELT students as well as pre- and in-service EFL teachers an overview about the advantages and disadvantages of CLIL approach among many other educational approaches in the field of language integrated learning. They can further decide on how to teach language and subject in their own regional, social, and cultural context.

To conclude, the cultural aspect presented during the CLIL training in this research might be considered by the teachers as one more source for teaching culture in various fields of education.

5.5 Recommendations

To start with, the current research provide a relatively new insight into the efficacy of CLIL teacher training program related to the EFL pre-service teachers' self-efficay beliefs, that has not been studied extensively, especially in Turkish EFL context. Thus, the findings of this research might contribute to the literature regarding teacher training on CLIL implementation. On the other hand, needless to say, the limitations of the current research such as small sampe size limited to 28 Turkish ELT students, short period of training (3 weeks), limited number of the reserach instruments, or one same group of participants do not allow to generalize the obtained results to all Turkish EFL pre-service teachers. The data received from the teacher trainer or observer and the analysis of reflective journals keeped by the trainer or trainees participated in this research concerning the creation of lesson plans might give different results. Furthermore, the focus of this study was the effect of CLIL teacher training on the participants' self-efficacy beleifs and attitudes towrads CLIL, what also can be changed in further investifations. Finally, it also might be recommended to train practicing teachers on CLIL in further research so that the efficacy of CLIL teacher training might be measured and analyzed on the basis of real teaching experinece.

REFERENCES

- Adesope, O. O., Lavin, T., Thompson, T., & Ungerleider, C. (2010). A systematic review and meta-analysis of the cognitive correlates of bilingualism. *Review of Educational Research*, 80(2), 207-245. doi: 10.3102/0034654310368803
- Aiello, J., Di Martino, E., & Di Sabato, B. (2015). Preparing teachers in Italy for CLIL: Reflections on assessment, language proficiency and willingness to communicate. *International Journal of Bilingual Education and Bilingualism*, 20(1), 69-83. doi: 10.1080/13670050.2015.1041873
- Banegas, D. L. (2012). CLIL teacher development: Challenges and experiences. Latin American Journal of Content & Language Integrated Learning, 5(1), 46-56. doi:10.5294/laclil.2012.5.1.4 ISSN 2011-6721
- Banegas, D. L. (2015). Sharing views of CLIL lesson planning in language teacher education. *Latin American Journal of Content and Language Integrated Learning*, 8(2), 104-130. doi:10.5294/laclil.2015.8.2.3
- Bicaku, R, C. (2011). CLIL and Teacher Training. *Procedia Social and Behavioural Sciences*, 15, 3821-3825. doi:10.1016/j.sbspro.2011.04.379
- Bozdogan, D., & Karlıdag, B. (2013). A case of CLIL practice in the Turkish context: Lending an ear to students. *Asian EFL Journal*, *15*(*4*), *1-22*. Retrieved from https://scholar.google.com.tr/scholar?hl=en&as_sdt=0%2C5&q=Bozdoga n+and+Karl%C4%B1dag%2C+2013&btnG
- Broomhead, L. V. (2017). *Change* (Content book). Washington, DC: Mentora Publishing.
- Bruning, C. I., & Purranann, M.S. (2014). CLIL pedagogy in Europe: CLIL teacher education in Germany. *Utrecht Studies in Language and Communication*, 27, 315-338. Retrieved from https://search.proquest.com/docview/1521945302?pq-origsite=gscholar
- Cambridge online dictionary. (2018). *Cambridge University Press*. Retrieved from https://dictionary.cambridge.org/about.html

- Cenoz, J. (2015). Content-based instruction and content and language integrated learning: the same or different? *Language, Culture and Curriculum*, 28(1), 8–24. doi: 10.1080/07908318.2014.1000922
- Chansri, C., & Wasanasomsithi, P. (2016). Implementing CLIL in higher education in Thailand: The extent to which CLIL improves agricultural students' writing ability, agricultural content, and cultural knowledge. *PASAA: Journal of Language Teaching and Learning in Thailand*, 51, 15-38. Retrieved from https://files.eric.ed.gov/fulltext/EJ1112239.pdf
- Cimermanova, I. (2017). CLIL a dialogue between the language and subject teachers. *Scientia et Eruditio*, *I*, 1-15. Retrieved from https://www.researchgate.net/publication/322992382
- Cohen, J. (1992). A power primer. *Psychological Bulletin*, 112(1), 155-159. Retrieved from http://www2.psych.ubc.ca/~schaller/528Readings/Cohen1992. pdf
- Coyle, D., Hood, P., & Marsh, D. (2010). [Review of the book *CLIL: Content and language integrated learning*]. *Language and Education*, 25(2), 182-185. doi: 10.1080/09500782.2010.539045
- Coyle, D. (2005). CLIL. Planning tools for teachers. Retrieved April 20, 2018, from https://www.unifg.it/sites/default/files/allegatiparagrafo/20-01 2014/coyle_clil_planningtool_kit.pdf
- Creswell, J. W., & Miller, D. L. (2010). Determining validity in qualitative inquiry. *Theory Into Practice*, 39(3), 124-130. doi: 10.1207/s15430421tip3903_2
- Creswell, JW, Plano Clark, VL (2007) Designing and Conducting Mixed Methods Research. Thousand Oaks, CA: Sage
- Dalton-Puffer, C., Huettner, J., Schindelegger, V., & Smit, U. (2009) Technology-geeks speak out: what students think about vocational CLIL. *International CLIL Research Journal*, 1 (2), 17-26. Retrieved from https://eprints.soton.ac.uk/143717/

- Darn, S. (2015). CLIL: A lesson framework. *British Council*. Retrieved from https://www.teachingenglish.org.uk/article/clil-a-lesson-framework
- De Mesmaeker, E. & Lochtman, K. (2014). Belgian CLIL teachers' professional identity. In D. Abendroth-Timmer & E. M. Hennig (Eds.), *Plurilingualism and Multiliteracies* (pp. 191-208). Frankfurt am Main, Berlin, Bern, Bruxelles, New York, Oxford, Wien: Peter Lang.
- De Santo, M. & De Meo, A. (2016). E-training for the CLIL teacher: e-tutoring and cooperation in a Moodle-based community of learning. *Journal of e-Learning and Knowledge Society*, 12(3), 41-49. Retrieved from file:///C:/Users/User/Desktop/CLIL%20articles/article_173474.pdf
- Delicado Puerto, G., & Pavon Vazquez, V. (2016). Training primary student teachers for CLIL: innovation through collaboration. *Puls*, *39*, 35-57. Retrieved from https://ebuah.uah.es/dspace/bitstream/handle/10017/28243/training_delicado% 20_PULSO_2016.pdf?sequence=1&isAllowed=y
- Demirdirek, N., Özgirin, N., & Salatacı, R. (2010). E-documentaries in content-based instruction (CBI) in an academic EFL setting. Procedia Social and Behavioral Sciences, 3, 203-209. Retrieved from https://www.sciencedirect.com/science/article/pii/S1877042810014072?via%3Dihub
- Doiz, A., & Lasagabaster, D. (2017). Management teams and teaching staff: do they share the same beliefs about obligatory CLIL programmes and the use of the L1? *Language and Education*, 31(2), 93-109. doi: 10.1080/09500782.2017.1290102
- Dörnyei, Z. (2007). Research methods in applied linguistics: quantitative, qualitative, and mixed methodologies. Oxford: Oxford University Press.
- Griva, E., & Chostelidou, D. (2017). CLIL in primary education: Promoting multicultural citizenship awareness in the foreign language classroom. Research Papers in Language Teaching and Learning, 8(2), 9-23. Retrieved from http://eds.a.ebscohost.com/eds/pdfviewer/pdfviewer?vid=1&sid=9a70a9f c-a312-432f-9428-f4f018740ced%40sessionmgr4008

- Guadamillas Gomez, M. V. (2017). Trainee primary-school teachers' perceptions on CLIL instruction and assessment in universities: A case study. *Acta Scientiarum*. *Education*, 39(1), 41-53. doi: 10.4025/actascieduc.v39i1.32901
- Huck, S. W. (2012). Reading statistics and research. Boston: Pearson.
- Ivankova, N. V., Creswell, J. W., & Stick, S. L. (2006). Using mixed-methods sequential explanatory design: from theory to practice. *Field Methods*, *18*(1), 3-20. Retrieved from http://journals.sagepub.com/doi/pdf/10.1177/1525822X05282260
- Johnson, R. B., Onwuegbuzie, A. J., & Turner, L. A. (2007). Toward a definition of mixed methods research. *Journal of Mixed Methods Research*, 1(2), 112-133. doi: 10.1177/1558689806298224
- Kalogerakou, K., Baka, M., & Lountzi, M. (2017). A CLIL model: Teaching science at secondary education. *Research Papers in Language Teaching and Learning*, 8(2), 136-148. Retrieved from http://eds.b.ebscohost.com/eds/pdfviewer/pdfviewer?vid=2&sid=ea8308ef-861a-45a9-9a18-e37ebd08f8e0%40sessionmgr104
- Karimvand, P. N. (2011). The nexus between Iranian EFL teachers' self-efficacy, teaching experience and gender. *English Language Teaching*, *4*(3), 171-183. doi:10.5539/elt.v4n3p171
- Kewara, P., & Prabjandee, D. (2018). CLIL teacher professional development for content teachers in Thailand. *Iranian Journal of Language Teaching Research*, 6(1), 93-108.
 Retrieved from https://www.researchgate.net/profile/Denchai_Prabjandee/publi cation/322221792_CLIL_Teacher_Professional_Development_for_Content_Te

achers_in_Thailand/

Kiraz, A., Güneyli, A., Baysen, E., Gündüz, S., & Baysen, F. (2010). Effect of science and technology learning with foreign language on the attitude and success of students. *Procedia Social and Behavioral Sciences*, 2, 4130–4136. doi: doi:10.1016/j.sbspro.2010.03.652

- Kirkgoz, Y. (2007). English language teaching in Turkey: policy changes and their implementations. *RELC Journal*, 38(2), 216-228. doi: 10.1177/0033688207079696
- Krippendorff, K. (1989). Content analysis. In E. Barnouw, G. Gerbner, W. Schramm,
 T. L. Worth, & L. Gross (Eds.), *International encyclopedia of communication*(Vol. 1, pp. 403-407). New York, NY: Oxford University Press. Retrieved from http://repository.upenn.edu/asc_papers/226
- Loranc-Paszylk, B. (2009). Integrating reading and writing into the context of CLIL classroom: Some practical solutions. *International CLIL Research Journal*, *1*(2), 47-53.
- Marsh, Mehisto, Wolff, & Martin, 2010. (n.d.) European framework for CLIL teacher education. *European Center for Modern Languages*. Retrieved from https://www.unifg.it/sites/default/files/allegatiparagrafo/20-01-2014/european_framework_for_clil_teacher_education.pdf
- Mattheoudakis, M. (2017). CLIL from theory to practice: challenges and perspectives. *Research Papers in Language Teaching and Learning, 8*(1), 15-21. Retrieved from http://rpltl.eap.gr/current-issue/volume-8-issue-1-part-1-february-2017/volume-8-issue-1-part-1-february-2017/133-clil-from-theory-to-practice-challenges-and-perspectives-an-interview-with-dr-marina-mattheoudakis
- McDougald, J. (2015). Teachers' attitudes, perceptions and experiences in CLIL: A look at content and language. *Colomb. Appl. Linguist. J.*, 17(1), 25-41. doi: http://dx.doi.org/10.14483/udistrital.jour.calj.2015.1.a02
- Mehisto, P. (2008). CLIL counterweights: recognizing and decreasing disjuncture in CLIL. *International CLIL Research Journal*, *1*(1), 93-119. Retrieved from http://www.icrj.eu/11/article8.html
- Meyer, O. (2010). Introducing the CLIL-pyramid: Key strategies and principles for quality CLIL planning and teaching. In M. Eisenmann, & T. Summer (Eds.), *Basic Issues in EFL-Teaching and Learning* (pp. 11-29). Heidelberg: Winter.

- Muszynska, A., Urpi, C., & Galazka, A. (2017). Teacher education through drama.CLIL practice in the Spanish context. *Estudios Sobre Educacion*, 32, 179-195.Doi: 10.15581/004.32.179-195
- Pagano, R. R. (2001). *Understanding statistics in the behavioral sciences*. Australia: Wadsworth-Thomson Learning.
- Papaja, K. (2013). The role of a teacher in a CLIL classroom. *Glottodidactica*, 11(1), 147-154. Retrieved from https://pressto.amu.edu.pl/index.php/gl/article/viewFile/373/280
- Perez Canado, M. L. (2016). Are teachers ready for CLIL? Evidence from a European study. *European Journal of Teacher Education*, 39(2), 202-221. doi:10.1080/02619768.2016.1138104.
- Pokrivcakova, S., Babocka, M., Bereczky, K., Bodorik, M., Bozdogan, D., Dombeva, L., et al. (2013). [Review of the book *CLIL in foreign language education*]. *KEGA 036UKF-4*, 281. Nitra, Slovakia: Constantine the Philosopher University. Retrieved from http://www.klis.pf.ukf.sk/dokumenty/SEN/e-textbook%20SEN.pdf#page=30
- Ruiz de Zarobe, Y., & Jiminez Catalan, R. M. (Eds.). (2009). *Content and language integrated learning: Evidence from research in Europe*. London/New York: Multilingual Matters.
- Shenton, A. K. (2004). Strategies for ensuring trustworthiness in qualitative research projects. *Education for Information*, 22, 63–75. Retrieved from https://www.researchgate.net/profile/Andrew_Shenton2/publication/22870823 9_Strategies_for_Ensuring_Trustworthiness_in_Qualitative_Research_Projects /links/56cd506808ae85c8233bc986.pdf
- Sierens, S., & Van Avermaet, P. (2014). Language diversity in education: evolving from multilingual education to functional multilingual learning. In D. Little, C. Leung, & P. Van Avermaet (Eds.), Managing diversity in education: Languages, Policies, Pedagogies (pp. 204-222). Bristol: Multilingual Matters.

- Small, M. L. (2011). How to conduct a mixed methods study: Recent trends in a rapidly growing literature. *The Annual Review of Sociology*, *37*, 57-86. doi: 10.1146/annurev.soc.012809.102657
- Soler, D., Gonzalez-Davies, M., & Inesta, A. (2017). What makes CLIL leadership effective? A case study. *ELT Journal*, 71(4), 478-490. doi: 10.1093/elt/ccw093
- Surmont, J., Struys, E., & Somers, T. (2015). Creating a framework for a large-scale implementation of Content and Language Integrated Learning. *European Journal of Language Policy*, 7(1), 29-41. doi: 10.3828/ejlp.2015.3
- Swain, M., & Lapkin, S. (2005). The evolving socio-political context of immersion education in Canada: some implications for program development. *International Journal of Applied Linguistics*, 15(2), 169-186. Retrieved from http://www.yorku.ca/fmougeon/documents/IJAL_086.pdf
- Thanasegaran, G. (2009). Reliability and validity issues in research. *Integration & Dissemination*, 4, 35-40. Retrieved from http://aupc.info/wp-content/uploads/35-40-ganesh.pdf
- Tongco, M. D. C. (2007). Purposive sampling as a tool for informant selection. *Ethnobotany Research & Applications*, 5, 147-158. doi: http://hdl.handle.net/10125/227
- Tschannen-Moran, M., Woolfolk Hoy, A. & Hoy, W. K. (1998). Teacher efficacy: Its meaning and measure. *Review of Educational Research*, 68(2), 202 248. Retrieved from http://www.jstor.org/stable/pdf/1170754.pdf?refreqid=excelsior %3A01d75950787f3f1747bc5ffc02d83ebe
- Tschannen-Moran, M., & Hoy, A. W. (2001). Teacher efficacy: Capturing an elusive construct. *Teaching and Teacher Education*, *17*, 783-805. Retrieved from http://wps.ablongman.com/wps/media/objects/2347/2404137/Megan_Anita.pd
- Turkey an overview of CLIL. (n.d.) Retrieved April 20, 2018, from https://www.factworld.info/en/Turkey-An-Overview-of-CLIL

- Wielander, E. (2013). Something to talk about: Integrating content and language study in higher education, (79). Birmingham: Aston University. Retrieved from https://www.unifg.it/sites/default/files/allegatiparagrafo/22-01-2014/wielander_what_is_clil-clil_at_aston_university.pdf
- Yessenova, A. (2017, August). Teacher Education for Teaching Content in English: Self-Efficacy Beliefs and Perceptions of Science and Mathematics Pre-Service Teachers in Kazakhstan. Paper presented at the annual conference of European Educational Research Association' (EERA), Freie Universität, Berlin.
- Yuksel, G., & Kavanoz, S. (2011). In search of pre-service EFL certificate teachers' attitudes towards technology. *Procedia Computer Science*, *3*, 666–671. doi: 10.1016/j.procs.2010.12.111
- Yildiz-Genc, Z. S. (2011). EFL in higher education: Designing a flexible content-based curriculum at university-level. *Asian EFL Journal*, *13*(1), 85-114. Retrieved from http://asian-efl-journal.com/PDF/March-2011-zyg.pdf

Appendix A

Background Information

1. W	hat is you	ır age, ş	grade?	
------	------------	-----------	--------	--

- 2. What is your gender? Female Male
- 4. What is your native language? _____
- 3. What is your level of English language proficiency?

The Teacher Self-Efficacy Scale

The purpose of this questionnaire is to examine perceived self-efficacy beliefs (Moran & Hoy, 2001) of you as a pre-service EFL teacher. There is no right or wrong answer. On the scale from 1 to 9, where 1 is nothing and 9 - a great deal, please indicate your opinion about each of the statements given in the table below:

1 – nothing	5 – some influence	9 – a great deal
3 – very little	7 – quite a bit	

Teacher beliefs	nothing		very little		some influence		quite a bit		a great deal
1. To what extent can you use a variety of assessment strategies?	1	2	3	4	5	6	7	8	9
2. To what extent can you provide an alternative explanation or example when students are confused?	1	2	3	4	5	6	7	8	9
3. To what extent can you craft good questions for your students?	1	2	3	4	5	6	7	8	9
4. How well can you implement alternative strategies in your classrooms?	1	2	3	4	5	6	7	8	9
5. How well can you respond to difficult questions from your student?	1	2	3	4	5	6	7	8	9
6. How much can you do to adjust your lessons to the proper level for individual students?	1	2	3	4	5	6	7	8	9
7. To what extent can you gauge students' comprehension of what you have taught?	1	2	3	4	5	6	7	8	9
8. How well can you provide appropriate challenges for very capable students?	1	2	3	4	5	6	7	8	9

Appendix A (cont.d)

9. How much can you do to control	1	2	3	4	5	6	7	8	9
disruptive behavior in the classroom?								_	
10. How much can you do to get children	1	2	3	4	5	6	7	8	9
to follow classroom rules?									
11. How much can you do to calm a	1	2	3	4	5	6	7	8	9
student who is disruptive or noisy?									
12. How well can you establish a	1	2	3	4	5	6	7	8	9
classroom management system with each									
group of students?									
13. How well can you keep a few	1	2	3	4	5	6	7	8	9
problem students from ruining an entire									
lesson?									
14. How well can you respond to defiant	1	2	3	4	5	6	7	8	9
students?									
15. To what extent can you make your	1	2	3	4	5	6	7	8	9
expectation clear about student behavior?									
16. How well can you establish routines	1	2	3	4	5	6	7	8	9
to keep activities running smoothly?									
17. How much can you do to get students	1	2	3	4	5	6	7	8	9
to believe they can do well in									
schoolwork?									
18. How much can you do to help your	1	2	3	4	5	6	7	8	9
students value learning?									
19. How much can you do to motivate	1	2	3	4	5	6	7	8	9
students who show low interest in									
schoolwork?									
20. How much can you assist families in	1	2	3	4	5	6	7	8	9
helping their children do well in school?									
21. How much can you do to improve the	1	2	3	4	5	6	7	8	9
understanding of a student who is failing?	_	_							
22. How much can you do to help your	1	2	3	4	5	6	7	8	9
students think critically?	•	_	J	•	J	O	•	Ü	
23. How much can you do to foster	1	2	3	4	5	6	7	8	9
student creativity?	•	_	-	•	٠	O	,	Ü	
24. How much can you do to get through	1	2	3	4	5	6	7	8	9
the most difficult students?	1	_	5	•	٥	5	,	5	
and most difficult students.									

Adapted from the original version of Tschanen-Moran & Hoy (2001).

Appendix B

The Attitudes & Experiences in CLIL Questionnaire

This scale is targeted to explore your attitudes towards CLIL instruction, to what extent you agree or disagree with each of the statements. On the scale of 1 to 5, where 1 is strongly disagree and 5 is strongly agree, please circle the degree to which you agree or disagree with each of the statements below:

Strongly Disagree – SD Disagree – D Uncertain - UN Agree – A
Strongly Agree – SA

Statements	SD	D	UN	A	SA
1. I would like to know more about CLIL.	1	2	3	4	5
2. I would like to be given the opportunity to teach subject content (Mathematics, Science, Art, Music, Geography, Literature, Social Studies) through English.	1	2	3	4	5
3. My experience in teaching subject content through English has been positive.	1	2	3	4	5
4. CLIL benefits students.	1	2	3	4	5
5. CLIL helps students develop only their language skills.	1	2	3	4	5
6. CLIL helps students develop only their subject knowledge.	1	2	3	4	5
7. CLIL helps students develop both their language skills and subject knowledge.	1	2	3	4	5
8. CLIL requires more methodology knowledge than ELT teachers possess.	1	2	3	4	5
9. CLIL requires more subject knowledge than teachers ELT teachers possess.	1	2	3	4	5
10. CLIL requires a lot of time (both lesson planning and teaching).	1	2	3	4	5
11. CLIL requires new teaching materials.	1	2	3	4	5
12. CLIL requires a lot of administrative support.	1	2	3	4	5
13. CLIL requires cooperation with subject teachers.	1	2	3	4	5
14. CLIL is only possible with intermediate students of English.	1	2	3	4	5
15. CLIL is only possible with young learners.	1	2	3	4	5
16. CLIL only possible with older students.	1	2	3	4	5
17. I would be interested in participating in future CLIL research projects.	1	2	3	4	5

Adapted from McDougald (2015)

Appendix C

Semi-structured Interview Questions

- 1. How do you understand the term 'CLIL'?
- 2. Do you think you possess knowledge about CLIL and competences for teaching through CLIL?
 - If yes, can you support your arguments with an example?
 - If no, can you support your arguments with an example?
- 3. Do you have enough knowledge about CLIL instructional strategies? If yes, can you support your arguments with an example? If no, can you support your arguments with an example?
- 4. Do you think you are competent in managing CLIL classroom?
- 5. How can you enhance student engagement in CLIL classroom?
- 6. Do you think CLIL should play a stronger role in the Turkish ELT curriculum

Appendix D

CLIL Lesson Plan Template

CLIL lesson title
Subject
[Course Subject]
Teacher
Grade & Level
Lesson Overview
Language Ohio Aires
Lesson Objectives:
Basic competences:
Duration:
Resources and materials:
CLIL Lesson Framework

Content	Subject			
Cognition	Learning outcomes (students will be able to)			
Communication	Vocabulary	Structure	Functions	Skills
Culture				

Lesson procedure

Phases	Teacher Guide	Students outcomes

Evaluation

Appendix E

Informed Consent Letter

Dear Participants,

Currently, I am pursuing my Master's degree in English Language Teaching

program at Bahcesehir University. This year, I have been working on my MA Thesis

about self-efficacy beliefs of Turkish pre-service teachers before and after the

implementation of CLIL-based training. Therefore, we would appreciate your

contribution if you could kindly participate by completing the Teachers' Sense of

Efficacy Scale (TSS) and the Attitude and Experiences in CLIL questionnaire which

have been adapted to serve as data collection instruments for our research.

The TSS consists of three subscales (instructional strategies, classroom

management, and student engagement) with 24 sample items and the Attitude

questionnaire with 17 items provided in the table together with the response options

for your choice. The questionnaire will not take you more than 30 minutes. We

inform you that your identity will be kept private and confidential, and all the

information we gather will be used for the research purposes only. Moreover,

participation is voluntary and you have the right to withdraw from the study at any

stage.

If you have any questions or concerns, please do not hesitate to contact me via

email: <u>kasymova.giuzal@mail.ru</u>

Thank you for your kind cooperation.

Guzyal Kassymova

80

Appendix F

CLIL Pre-service Teacher Training Programme

Period	Time	Learning Objectives	Content	Methodology, Materials, & Resources
Week 2	1 hour	The trainees will be introduced to CLIL and its general overview.	 Definition of CLIL; CLIL implementation and outcomes (general findings); Pre-history of CLIL; CLIL characteristics &benefits CLIL aims & principles; Theoretical background 	 Lecture and discussion PowerPoint slides Video by D. Marsh retrieved from https://european contest.wikispac es.com/2.+And +the+winner+is+CLIL
Week 3	2 hours	1. The trainees will gain deeper insight into the theoretical framework of CLIL, the ways to plan and teach CLIL-based lessons; 2. The trainees will become familiar with the existing CLIL lessons plans at different educational levels.	 Session 1 CLIL 4 Cs Theory; Language Triptych; Bloom's taxonomy CLIL implementation parameters; CLIL strategies for lesson planning; Types of activities; CLIL teacher competencies; CLIL lessons at primary, secondary, tertiary educational levels. Session 2 	 Lecture and discussion PowerPoint slides Video by D. Marsh retrieved from https://europea ncontest.wikisp aces.com/2.+A nd+the+winner +is+CLIL
		3. The trainees will be able to analyze the lesson plans and give their perspectives	CLIL lesson plans at different educational levels	 Coyle (2005); Coyle, Hood, & Marsh (2010); Pokrivcakova et al., (2013). Broomhead (2014).

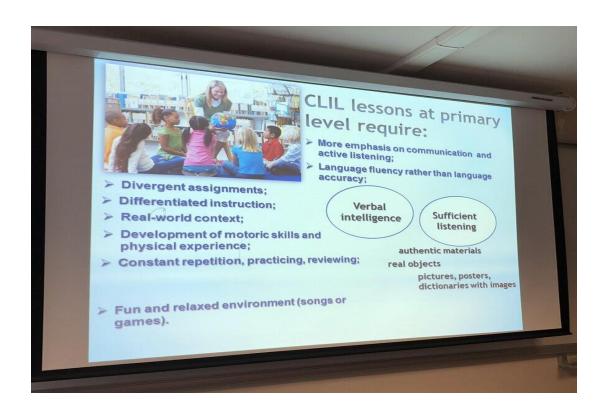
Appendix F (cont.d)

Week 4	2	1. The trainees	Session 1	• Activity:
	hours	will be able to		CLIL 4 Cs
		revise the	CLIL 4 Cs Framework	Framework
		Coyle's (2005)		(Coyle, 2005)
		CLIL 4 Cs		mind map
		framework.		-
		2. The trainees	Session 2	Textbook
		will present		(Broomhead,
		and explain	CLIL lesson plans	2014);
		their own	r	_01./,
		CLIL lesson		 PowerPoint
		plans.		Slides
		3. The trainees		Sinces
		will get a		
× 7		feedback from		
		peers and		
		trainer.		

Appendix G

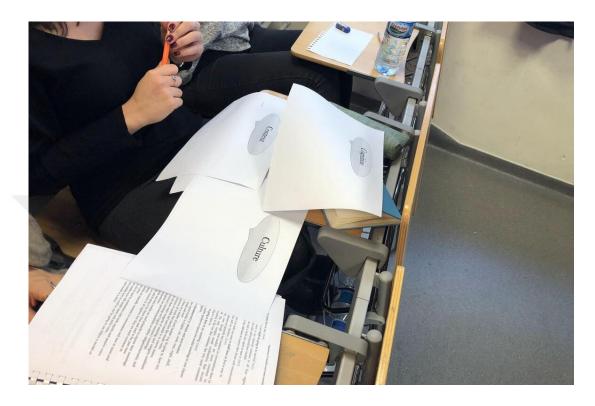
Photos from CLIL Pre-service Teacher training presentation

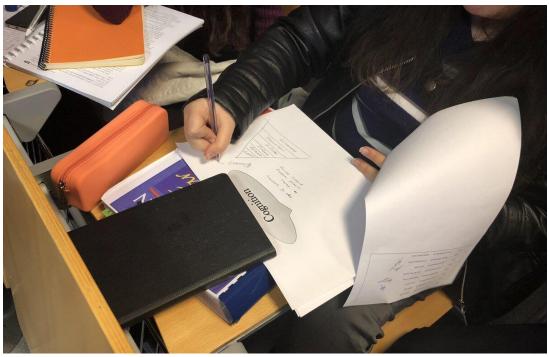




Appendix H

Photos from CLIL 4 Cs framework workshop





CURRICULUM VITA

PERSONAL INFORMATION

Surname, Name: Kassymova, Guzyal

Nationality: Turkish (T.C.)

Date and Place of Birth: 9 December 1994, Almaty, Kazakhstan

Marital Status: Single Phone: +90 409 54 96

email: guzyallllkas@gmail.com

EDUCATION

Degree	Institution	Year of Graduation
BS	Kazakh National University	2016
	named after al-Farabi,	
High School	Secondary gymnasium school,	2012
	Almaty	

WORK EXPERIENCE

Year	Place	Enrollment
2015	Almaty, FL center	Personal tutoring, teaching FL
		Organization of Model UN -
		New Silk Way

FOREIGN LANGUAGES

Advanced English, French B2, Kazakh B2, Advanced Russian, Turkish

CERTIFICATES

Certificate from Kazakh Academy of Sciences (Project in history), IELTS certificate, Almaty/Kazakhstan

HOBBIES

Books, writing, yoga, English Drama Club