Master's thesis

NTNU
Norwegian University of Science and Technology
Faculty of Social and Educational Sciences
Department of Teacher Education

Frøydis Grann

"Oh, interesting key word! Let's discuss it"

Norwegian ESL teachers' experience with digital educational resources as a supportive element of CLT

A qualitative case study

Master's thesis in Didactics for English and Foreign Language Education
Supervisor: Fredrik Mørk Røkenes
June 2020

NTNU
Kunnskap for en bedre verden

Frøydis Grann

"Oh, interesting key word! Let's discuss it"

Norwegian ESL teachers' experience with digital educational resources as a supportive element of CLT

A qualitative case study

Master's thesis in Didactics for english and foregin languages
Supervisor: Fredrik Mørk Røkenes
June 2020

Norwegian University of Science and Technology
Faculty of Social and Educational Sciences
Department of Teacher Education

NTNU
Kunnskap for en bedre verden

Abstract

The current study seeks to explore how English second language (ESL) teachers can construct communicative ESL classrooms using digital educational resources (DER) as a supportive element in the process of developing classroom communication. Communicative Language Teaching (CLT) is a worldwide recognised teaching approach that especially focuses on the notion of communication for learning, where pupils, by using authentic real-life tasks, are encouraged to engage in communication developing communicative competence. DER provides countless of teaching opportunities and has become a persistent part of the Norwegian school. DER can provide authenticity through various media, which in regard to CLT's focus on authenticity can contribute as a valuable support. Limited research is conducted on these two issues in relation, which this study seeks to enlighten.

In this study three ESL teachers were observed for about two weeks. The main emphasis was to explore how they focused on communication and how digital educational resources were used as a supportive element in the facilitation of CLT. The research was designed as a qualitative case study, and the data were collected through interviews, observations and reflection logs. The results of the study indicated that the teachers were concerned with oral communication. Their experience with DER showed divergence. They agreed on the many opportunities that DER contributed with, but possessed divergent digital literacy, and their opinions differed on the aspect of how and how much DER should be incorporated in their teaching. Challenges such as DER as a distraction and pupils' fear of speaking in front of their peers were emphasised by the teacher.

Overall, the study has demonstrated that there is potential in using DER as a supportive element in the facilitation of CLT. The limitations and opportunities lie within the teacher's digital literacy and the access to applicable DER.

Key words: CLT, English Second Language (ESL), Digital educational resources (DER), Norwegian ESL teachers, Educational research

Sammendrag

Denne studien undersøker hvordan andrespråkslærere i engelsk (ESL) kan etablere kommunikative engelskklasserom hvor digitale læringsressurser (DER) brukes som et støttende element i utviklingsprosessen av klasseromskommunikasjon. Kommunikativ språklæring (CLT) er en globalt anerkjent tilnærming til læring, som spesielt fokuserer på ideen om «kommunikasjon for læring», hvor elevene gjennom autentiske og virkelighetsnære oppgaver oppfordres til å delta i kommunikasjon for å utvikle kommunikativ kompetanse. DER tilgjengeliggjør utallige undervisningsmuligheter og har blitt et etablert element i den norske skolen. DER kan tilføre autentisitet gjennom ulike medier, og med tanke på CLTs fokus på autentisitet kan DER fungere som en verdifull støtte. Det er gjennomført begrenset forskning rundt relasjonen mellom CLT og DER, hvilket denne studien forsøker å belyse.

I denne studien ble tre ESL lærere observert i omtrent to uker. Hovedpoenget var å utforske hvordan de fokuserte på kommunikasjon og hvordan DER ble benyttet som et støttende element i fasiliteringen av CLT. Forskningen ble utformet som en kvalitativ case studie og data ble samlet inn gjennom intervju, observasjoner og refleksjonsnotater. Resultatene av studien indikerte at lærerne var opptatt av muntlig kommunikasjon. Deres erfaring med DER varierte. De var enige om de mange muligheter som DER bidrar med, men de hadde ulik digital kompetanse og ulike meninger angående hvordan og hvor mye DER burde inkorporeres i undervisningen deres. Utfordringer som ble nevnt av lærerne var DER som en distraksjon og elevenes frykt for å snakke foran medelevene sine.

Samlet sett har studien vist at det er et potensiale for bruk av DER som et støttende element i fasiliteringen av CLT. Begrensningene og mulighetene ligger i lærerens digitale kompetanse og tilgangen til brukervennlig DER.

Nøkkelord: CLT, Andrespråkslærere i engelsk (ESL), Digitale læringsressurser (DER), Norske engelsklærere, pedagogisk forskning

Acknowledgements

Last summer I found a note in one of my old notebooks from lower secondary school, which said “I HATE English mock Exam”. With this note in mind, it is funny and at the same time absurd, knowing that I have just completed my master’s thesis in English. I am truly proud of my accomplishment. I look forward to teaching my future pupils the subject and language that I have learned to love and hopefully I can inspire them to achieve similar experiences.

The completion of this thesis became, due to personal obstacles, a lot more challenging than anticipated. It could not have been accomplished as a one-(wo)man show, and I would like to share my sincere gratitude to the people that supported me along the way. You deserve my recognition and gratitude.

First of all, I would like to thank my academic supervisor Fredrik Mørk Røkenes. Your patience and constant encouragement, your valuable feedback, and believe in my work has been invaluable.

Secondly, I would like to thank the teachers participating in this study, for taking the time and welcoming me into their classrooms. This project would not have been possible to carry out without you. Thanks to the pupils, allowing me to observe and learn from your communication.

Further I would like to thank my fellow students Oda and Anna, the best co-workers, providing professional support, feedback and most importantly laughter in times when most needed.

I also owe a great thank you to my family, and especially my mum, who has continually supported and believed in me, and never refused to offer assistance or proofreading of my work.

My room mates and good friends, Mari and Ine also deserve a sincere thanks for their support and for putting up with my constant concern about this thesis, the past months in Corona shutdown. I will also like to thank them for letting me turn our living room into a messy office.

Thanks to my dear Canadian sister Maura for proofreading the entire thesis. I am so grateful, but cannot promise that I will return the favour and proofread your future PhD.

Finally, I would like to thank Taylor for supporting words, and my best friends Frida and Ingvild’s relentless cheering. I promise that from now on, I am back in the social life.

Frøydis Grann

Trondheim, June 8th 2020

Table of contents

Index of figures

1. Introduction

Communication is considered the most important tool for learning (Alexander, 2008 in Børresen, 2016, p. 89). Using language is how pupils express and develop comprehension and learning, which requires teachers to create opportunities for communication.

This qualitative case study thesis seeks to explore how ESL teachers can construct communicative ESL classrooms and how digital educational resources can be incorporated to support the process of developing classroom communication.

1.1 Rationale and research question

This study is based on a social-constructivist view of learning, which emphasises that conversation is the "medium for *all* learning", supporting the notion that "effective teaching is essentially, a long conversation" (Mercer, as cited in Thornbury & Slade, 2006, p. 2). The abilities needed to participate in a conversation are complex and refer to more than answering questions. Aksnes (2016, p. 24)[1] describes the abilities needed to discourse as being able to concentrate, listen carefully and reflect on what you hear in order to take a stand and respond. It further involves developing your own arguments and exchanging knowledge and opinions to learn from each other. The Ludvigsen committee stated, in their report about the future school, the need for developing *the valuable conversation*[2]. It involves that through conversations and discussions organised by the teacher, the pupils learn to reflect on their own competence and learning, which helps them in the process of developing knowledge (Ludvigsens-utvalgets rapport, 2015, p. 77). Børresen (2016, p. 89) emphasises that communicative teaching is the most rewarding for the pupils, but the most challenging for the teachers.

The rationale behind this study is twofold. First, I am interested in examining ESL teachers' experience with communicative practice and how they use the CLT approach for the development of a communicative classroom. I find the teachers' perspective on communication particularly important because, as the Ludvigsen committee highlights, the facilitation of communication depends on the teacher. The CLT approach is a worldwide recognised teaching approach that especially focuses on the notion of communication for learning, where pupils, by using authentic real-life tasks, are encouraged to engage in communication for the purpose of allowing them to develop communicative competence (Savignon, 2007, p. 209). Limited

[1] Author's translation
[2] Authors translation of the term "Den gode samtalen"

research on oral skills in a Norwegian school context has been conducted and even less on oral communication. A study, posted on the populistic research website forskning.no, hence highlights the importance of this present study, as the headline of the article said: *Pupils talk too little in the classroom* (Rongved, 2019). It stated that Norwegian first grade primary school pupils barely speak in their lessons, except for answering questions asked by the teacher.

The study further indicated that the pupils were provided with minimal opportunities to talk as the researchers observed barely any open conversations between the pupils and teacher and limited group work. Svenkerud, Klette and Hertzberg's (2012, p. 40) study further present that as little as 20% of lessons are spent working on communicative tasks, and the majority of this time is spent on oral practice in terms of oral presentation[3]. The downgrade of oral communication aligns with Aksnes (2016, p. 16) who states that the oral aspect of the Norwegian education system has received little attention all together in all subjects, while reading and writing have been focused on in recent years, despite what the national curriculum encourages.

Oral skills were constituted in the national curriculum as one of the five basic skills in the National Curriculum for Knowledge Promotion of 2006 (LK06)[4], described as "creating meaning through listening and speaking, which involves mastering different linguistic and communicative activities and coordinating verbal and other partial skills" (Norwegian Directorate for Education and Training, 2012, p. 6)[5]. This entails in the English subject that the pupils need to learn to listen, speak and interact with others using the English language. They should be able to manage how to evaluate and adjust their expressions regarding the purpose, recipient and situation, as well as understand different variants of English (Utdanningsdirektoratet, 2006). This practical approach is reflected in the Common European framework of Reference for Languages, which describes communicative language competence as a combination of linguistic, pragmatic, and sociolinguistic features. In other words, language skills and -understanding and the social aspect of communication (Council of Europe, 2001, p. 13).

[3] Both studies mentioned (Rongved, 2019 and Svenkerud et al., 2012) are conducted in classrooms of the Norwegian subject as there is limited studies on this topic conducted Norwegian ESL classroom. Parallels can however be drawn between the two subjects as they are both language subjects

[4] This research project was planned and started on in 2018. I have therefore decided to stick to the LK06, instead of following the newly implemented curriculum "Subject renewal of the National Curriculum for Knowledge Promotion

[5] Author's translation

Oral skills as one of the five basic skills in the LK06 states its concern with the development of communicative competences. This is further substantiated by the English subject curriculum which states that, in line with English being a world language the pupils need to be able to speak and adapt their language to different communicative contexts. This involves the ability to speak in formal and unformal terms and to express yourself in consideration to various cultural- and polite remarks. These objectives are best obtained, and only achieved, when the pupils practice the language through communication.

The second rational of this study is to contribute to the research field on how digital educational resources can be used as a supportive element in the ESL classroom to assist the facilitation of CLT. Svenkerud and Opdal (2016, p. 109) argue that DER can promote different types of communication in the classroom, both for groups and the entire class, but emphasise that DER itself does not automatically change the teaching. The teacher plays an essential role to achieve the change.

In the last two decades DER has permeated Norwegian schools and is now markedly present in most classrooms (Gilje et al., 2016, p. 1). Digital skills have a significant position in the Norwegian school as one of the five basic skills in the Norwegian National Curriculum for Knowledge Promotion (LK06). The framework for basic skills articulates "Digital skills are a prerequisite for further learning and for active participation in working life and a society in constant change" (Norwegian Directorate for Education and Training, 2012, p. 12). It further emphasises that pupils should be able to communicate and interact with others in digital environments (p. 12). This shows the importance of applying DER in the ESL classroom and exploiting the benefits that DER can provide the teaching. Svenkerud and Opdal (2016, p. 109) refer to Norwegian studies which indicate that pupils are receptive to more open and creative use of DER rather than the seemingly standardised oral presentation. Especially communicative and interactional use of DER was especially requested by the pupils which aligns with this study. The current study examines how DER can function as a supportive element in a communicative ESL classroom. In order to find this out, I have formulated the following research question:

How do English second language teachers incorporate digital educational resources in the English second language classroom to facilitate Communicative Language Teaching?

The notion of CLT and DER to some degree seem to complement each other as CLT is concerned with an authentic approach to communication, whereas DER by using internet can provide the classroom with authentic resources. Gilje (2016, p. 52) highlights that one of the advantages of the ESL subject is the endless access to authentic resources online as English is a global language. Additionally, resources for learning are easily available as ESL applies to most countries in the world. How these digital resources are incorporated in the ESL classroom following a communicative approach is the teacher's decision, and this thesis presents how a selection of teachers conduct communicative tasks using DER as a supportive element.

1.2 Overall research design

To answer the research question above the study is carried out qualitatively. The choice of conducting a case study was appropriate as it is the preferred strategy when "how" and "why" questions are asked and when the focus of the study is on a contemporary phenomenon within real-life context (Yin, 1994, p. 1). The field of research was situated in a selection of English classrooms, belonging to the three volunteering teachers, where data was collected through classroom observations, audio recordings of the lessons, interviews of the three teachers and my personal reflection logs.

1.3 Definition of terms

In order to avoid ambiguity and misconceptions and provide for a common understanding of frequently used terms, I find it important to define some essential terms in this section. In this study the term second language learning (SLL) will refer to learning English in Norway and will more specifically be referred to as English as a second language (ESL). In the field of language research there exists a range of different terms for learning a language that is not your mother tongue, such as foreign language, target language and second language. The distinction between these terms is blurry, and they keep changing as English as a world language develops (Rindal, 2014, p. 7-8).

Rindal further states that English in Norway is traditionally referred to as a foreign language (FL), though emphasised that the development within business, audio-visual media and travel have transformed English into a familiar language for the majority of Norwegians, which makes it appropriate to use the term English as a second language (ESL) (U. Rindal, 2014, p. 7). This aligns with the Norwegian subject curriculum, that distinguishes between learning a second or third language, where English counts as a second language, whereas for instance French,

German or Spanish are referred to as foreign language (Norwegian Directorate for Education and Training, 2006).

As the digital aspect within educational research has increased in modern time, the range of describing terms are many. Studies I have read refer to it as technology, digital tools and digital resources, and some studies examine more specific resources, such as the interactive whiteboard. This study however uses the term digital educational resources (DER), which serves as an umbrella-term for all digital resources touched upon in this thesis. This is further elaborated in section 2.8.

1.4 Chapter Summary and Thesis Structure

The primary focus of this study is to examine how Norwegian ESL teachers implement digital educational resources to facilitate Communicative language teaching. This chapter has presented the background and purpose of this study, additional to the research question. The overall research design is described along with a clarification of essential terms. Following, chapter two presents the theoretical foundation of this study, where aspects related to CLT and DER are most prominent. Previous studies concerning CLT as part of the ESL classroom and DER as a supportive element in the facilitation of CLT are also presented. Chapter three elaborates the design of the research and the overlying approach. The methods applied for collecting and analysing data are thoroughly described as well as the measures taken to ensure the quality of the research. Following, the results of the analysis is presented in chapter four, before they are discussed according to relevant theory and data in chapter five. The final chapter six summarizes the thesis and the research question is revisited. This chapter further presents limitations for this study and suggestions for further research.

2. Theoretical foundations

This chapter includes a review of relevant theory and previous empirical research. In order to answer the research question: *How do English teachers implement digital educational resources in the ESL classroom to facilitate Communicative Language Teaching*, this chapter firstly engages in theory pertinent to language learning theories and second language acquisition, targeting the aspect of oral interaction in the language classroom. Secondly, it elaborates on the Communicative Language Teaching approach to teaching and the principles of communicative competence. Furthermore, theory about educational resources are presented as well as the development and importance of digital educational resources and digital literacy. Then it elaborates on meaningful learning with DER, where the theoretical framework of Technological Pedagogical of Content Knowledge (TPACK) is presented, as a meaningful approach to implement digital educational resources in the second language classroom. Finally, the chapter includes a section that provides an overview of related previous research.

2.1 A sociocultural perspective on how second languages are learned

The way we create knowledge can generally be divided into two levels. The primary socialization level is where the child acquires its first language through interaction with family and play with other children. The school functions as a mechanism for the secondary socialization level, that in time precedes the primary socialization level. At this stage the learning is organized and planned with the intention of systematically improving the child's ability to think, reflect and understand their surroundings (Säljö, 2016, pp. 22–25). Säljö (2016, pp. 32–34) describes learning as a complex phenomenon that is difficult to define. Psychologists, pedagogues, and researchers on equivalent fields often study learning as cognitive- and behavioural processes. Other disciplines like sociology, economics as well as pedagogy, focus on analysing learning in groups on a more collective level, like for instance how learning develops within an organisation or a classroom.

Several different theories have been proposed for how humans develop language. The most relevant for the current study is the one developed by the psychologist Lev Vygotsky, who considered learning to primarily develop from social interaction. He perceived humans to be a biologic, social, cultural, and historical species and emphasized that in order to understand learning it is necessary to consider the integrity of the four aspects together. Humans' capabilities, both physical, social, and intellectual, are not limited by biological preconditions, but our ability to develop and use *tools* in order to mediate our actions. He further argued that

in a supportive interactive environment, children are able to advance to a higher level of knowledge and performance via what he referred to as the *zone of proximal development*[6]. Through conversations with adults and other children, the child was provided with scaffolding, a sort of cognitive supportive structure that supported the child to make the most of the knowledge they have, but also acquire new knowledge from the person(s) it is interacting with (Lightbown & Spada, 2013, p. 25; Säljö, 2016, p. 108).

This shows that an important aspect of Vygotsky's thoughts is accordingly that humans' knowledge and capabilities are not limited from a biological perspective. Social interaction plays a key role in the development of knowledge, and the "more knowledgeable other" is important to learning. This may refer to a teacher, who has a higher level of knowledge or better understanding than the child itself. When the child uses available tools and help from the more knowledgeable other, it can learn and achieve much more.

On this foundation, this thesis views its theoretical grounds on a sociocultural perspective. The digital educational resources may be the tools and the teacher a mediating help. Furthermore, this thesis especially focuses on the Communicative Language Teaching approach (elaborated in section 2.3). This specific approach emphasises the importance of communication, co-operation with peers and teachers, who furthermore will function as the more knowledgeable other to the learner. This briefly shows that the aspects of communicative language teaching correlate with Vygotsky's view on learning.

In a digital context, and regarding the current thesis, the pupils also have access to a network of digital educational resources who could also serve as the 'more knowledgeable others' in addition to the people surrounding them. As a result of this, we understand language learning differently because of the new digital educational resources available. If used properly, they can play an important part in supporting the pupils' language learning. This thesis particularly investigates how these resources may assist to improve the pupils' oral communication.

2.1.2 Second Language Acquisition

In the field of linguistics Krashen (1982, p. 10) distinguishes between two independent ways of developing competence in a second language: *Second Language Acquisition* (SLA) and *Second*

[6] ZPD is described as "the current or actual level of development of the learner and the next level attainable through the use of mediating semiotic and environmental tools and capable adult or peer facilitation" (Shabani et al., 2010, p. 238).

Language Learning (SLL). SLL is referred to as a conscious development of a second language, that implies direct instruction of grammar rules. SLA, however, is described as a subconscious process, similar to how children develop ability in their first language. The language acquirer is using the language for communication but is not aware of the language acquiring in this process. In other words, Language Acquiring can be compared to the informal term of "picking up" a language (Krashen, 1982, p. 10). Second language acquisition can also be described as a developing system including its own evolving rules and patterns, not simply as imperfect versions of the target language. Second language learners do not learn language only through imitation and practice but produce sentences that are different to those they have heard. These sentences occur based on internal cognitive processes and prior knowledge that interact with the language they hear around them (Lightbown & Spada, 2013, p. 41).

Second language acquirers' draw on the patterns of other languages they already know as they try to identify the complexities of the new language they are trying to learn. As previous language-teaching methodologies primarily focused on rule memorization and translation exercises in order to learn a second language, SLA research has shifted towards a language learning that emphasizes communication for the pupils to learn how to express communicative needs (Gass et al., 2013, p. 2). With the aspect of second language acquisition in mind we investigate the importance of oral interaction in the classroom and further look into the aspect of Communicative Language Teaching.

2.2 Oral Interaction in the ESL classroom

Humans ability to communicate through language creates the foundation for the development of knowledge and the dissemination of experiences between individuals, groups, and society. By using language, we reveal insights and experiences by applying terms and expressions that actualize what we wish to say[7] (Säljö, 2016, p. 35). As Säljö stated, language has a fundamental role in the development of knowledge and conveying of experiences. In second language research, the use of oral language in the second language classroom has received an increasing interest the past decades and was viewed as a promising change from the narrower focus on language as grammar (Canale, 1983, p. 1). This view is further shared by researchers today.

Doqaruni (2014, pp. 1–2) argues that in the field of second language teaching, oral skills are highly important as the ability to communicate in a foreign language is the very core of what it

[7] Author's translation

means to be able to speak in a second language. He further indicates that pupils that actively participate in the language classroom have proven their academic achievements to increase, compared to the pupils that act more passive in class. There are numerous options to incorporate oral language teaching in the second language classroom, each with different advantages and disadvantages. This thesis, however, focuses on one of the most recognized approaches, Communicative Language Teaching (Savignon, 2007, p. 208). The following chapter further elaborates this approach to language teaching.

2.3 Communicative Language Teaching

The main aspect of Communicative Language Teaching (CLT) is described as the *engagement of learners in communication in order to allow them to develop their communicative competence*[8] (Savignon, 2007, p. 209). In a historical perspective, CLT has been viewed as a response to the Audio-Lingual Method's focus on *get it right from the beginning,* and is generally defined as a broad approach to teaching, instead of a teaching method with a specified set of classroom practices, and has had a major influence on language teaching practices around the world (AbdulRahman, 2015, p. 976; Banciu & Jireghie, 2012, p. 94).

2.3.1 Speaking, rather than reciting a language

At the time of CLTs origin, the norm within language teaching was pattern practice and error avoidance. It was more important to have a broad knowledge *about* the language, rather than being able to use it. For example, knowing German was tantamount to reciting grammatical phenomenon or literary works, but not being able to use the language in a conversation (Bjørke et al., 2014, p. 20). CLT however, highlights the fundamentally communicative properties of language through classrooms that are concerned with authenticity, real-world simulations and meaningful tasks (AbdulRahman, 2015, p. 976). The CLT approach aspires to help learners create meaning rather than helping them to develop perfect grammatical structures or acquire native-like pronunciation (Banciu & Jireghie, 2012, p. 94). The aim is to encourage pupils to ask for information, to seek clarification, to use circumlocution and other linguistic and non-linguistic resources they carry in order to negotiate meaning. This way the teacher constantly encourages learners to take risks and speak in self constructed sentences, instead of following memorized patterns (Savignon, 2007, p. 209).

[8] Communicative competence involves language learners ability to interact with other speakers (Savignon, 2007, p. 209)(2007, p. 209). See section 2.4 for further details

The CLT approach minimizes the attention on pronunciation and rather focuses on opportunities for communicative practice in contexts where the emphasis is on understanding and expressing meaning (Lightbown & Spada, 2013, pp. 68, 159). People that advocate for CLT have argued that language is not learned through gradual accumulation of one grammatical feature after another, but rather suggest that errors are a natural and valuable part of the language learning process (Lightbown & Spada, 2013, p. 156). This implies that successfully learning a foreign language depends on how well learners have developed their communicative competence, which we will look further into in a later section (Banciu & Jireghie, 2012, p. 94).

2.3.2 Mechanical, Meaningful and Communicative Practice

CLT serves as a teaching approach that can be implemented in the classroom in numerous ways. Some advocates of CLT emphasise distinguishing between three different kinds of practices to structure the planning of the communicative second language lesson more easily. These consists of: Mechanical practice, Meaningful practice and Communicative practice (J. C. Richards, 2006, p. 16).

Mechanical practice involves a controlled practice activity that the pupils are able to carry out successfully without necessarily fully understand the language they are using. This can for instance refer to repetition drills and substitution drills that are designed to practice the use of particular grammatical items.

Meaningful practice applies to activities that feels purposeful to the pupils. Language control is still provided, but the pupils are required to make meaningful choices when practice is carried out. A meaningful practice example can involve giving the pupils a street map and ask them to practice the use of prepositions by answering questions concerning the location of different buildings shown on the map, as for instance a café or the library. The connection of preposition practice along with an actual map, makes the task meaningful to the pupils as they have to respond according to the location of places on the map.

Communicative practice refers to activities where the focus is to practice the use of language within a real communicative context. In these activities real information is exchanged, and it is important that the language used is not predictable, but more a fluent conversation. An activity within this category could for instance be preparing and conducting an interview of another pupil's family or hobby. It could also be an activity where the pupils draw a map of their

neighbourhood and further answer questions about the locations of the closest school, the best soccer field, etc.

2.3.3 Not only communicative

CLT is not solely focusing on face-to-face oral communication, but rather involves different types of communicative approaches such as games, role-play and information gap, as well as judicious use of pronunciation and grammar focused activities (Banciu & Jireghie, 2012, p. 97; Savignon, 2007, p. 213). CLT enhances the importance of introducing the pupils to authentic texts and attempts to link the classroom language learning to language learning through authentic situations. This is because the pupil's motivation to learn derives from their aspiration to communicate in meaningful ways about meaningful topics (Banciu & Jireghie, 2012, p. 95).

Moreover, it is important to comment that the communicative approach does not refer only to oral skills. The principles of CLT equally apply to reading and writing activities as these skills need to evolve to build up the pupils' confidence in all skill areas. Activities like reading, interpretation, expression, summarizing and negotiation of meaning all contribute to make the pupils' manipulation of language more fluent (Banciu & Jireghie, 2012, p. 98; Savignon, 2007, p. 213). As language practice develops in response to the changes in society concerning communicative needs and opportunities, the way we consider communication does as well. Digital communication has now become a natural and commonly implemented part of modern communication additional to the two traditional channels: oral-, and written communication (Savignon, 2007, p. 212).

2.4 Communicative Competence

Savignon (2007, p. 209) describes the term communicative competence as classroom language learners' ability to interact with other speakers, or in other words the pupils' ability to *apply knowledge of a language with adequate proficiency to communicate* (Banciu & Jireghie, 2012, p. 94). Originally the term was introduced by Noam Chomsky in 1965, though he differentiated between performance and competence. He described competence as the language knowledge possessed by *an idealized native-listener speaker*, whereas the concept of performance entailed the use of language in real life situations. Dell Hymes on the other hand, found Chomsky's distinction too narrow and added language use and grammatical rules to the term communicative competence. He emphasized that communicative competence involves inherent grammatical competences along with the ability to use them in a variation of communicative

situations, and the capability to communicate effectively in various cultural settings (Mustafa, 2015, p. 16). Bjørke et al. (2014, p. 23) furthermore, indicates the importance of the socially and culturally conditioned rules that apply in order to hold communicative competence, and emphasizes that it consists of much more than only knowledge about grammatical structures.

2.4.1 Four aspects of Communicative competence

Several educators have throughout the years examined the term Communicative competence and many have presented models which illustrates their interpretation of the term. Canale (1983, p. 1) presented in 1983 a revised model of the original model presented by Canale and Swain in 1982. This modified model added the aspect of discourse competence to the three existing aspects: grammatical-, sociolinguistic- and strategic competence. In the myriad of options of models to follow, this thesis pursues the Canale revised interpretation of what Communicative competence consists of.

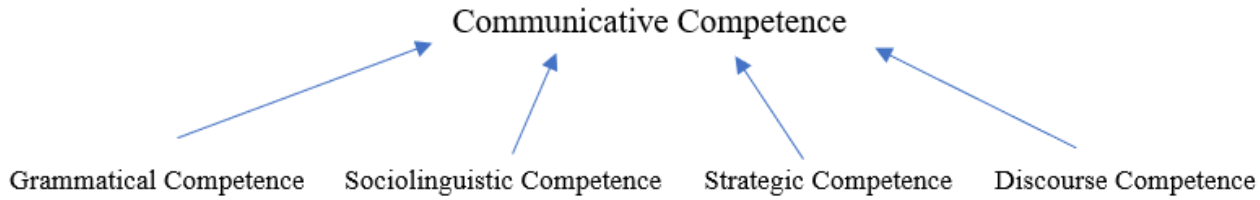


Figure 1. Communicative Competence Model Proposed by Canale (1983)

The aspect of *grammatical competence* refers to knowledge about language code, as for instance correct application of vocabulary rules, word and sentence formation, and pronunciation. These rules are necessary to comprehend in order to construct meaningful sentences. *Sociolinguistic competence* involves the use of appropriate language in a communication situation, while *strategic competence* concerns the deliberate use of verbal and nonverbal communication strategies when disruptions occur in a communication process. Finally, the revised and added aspect to communicative competence, d*iscourse competence*, is the ability to combine ideas and to understand and express oneself in a specific language (Mustafa, 2015, pp. 17–18).

Communicative competence, represented by the four mentioned subcategories, is necessary in order to learn and develop an understanding in all subjects in all grades. The oral language is a fundamental tool in the classrooms of today, where we separate between two forms of oral teaching. Teachers may teach their pupils oral (verbal, spoken, vocal) interaction, where they

systematically practice communicative competences, or it can be used as a teaching method (Kverndokken, 2016, pp. 21–22). The latter one being focused on for this study.

The goal of Communicative competence is that the pupils are taught their second language for the purpose of being able to use the language in authentic situations. This requires the teacher to bring "real life situations" into the classroom through choice of texts and authentic communicative approaches (Bjørke & Grønn, 2014, p. 30).

2.5 Development of communicative competences

In every group work and co-operation task, the conversation is the most useful communication method which requires the pupils to learn how to listen, receive and produce language. In order to be a good listener, the pupils need to know how to understand and interpret what they hear, called *cognitive listening*. They are also required to handle the *social listening*, which encompasses that they signal with speech and body language that they are concentrated listeners (Kverndokken, 2016, p. 24).

2.5.1 The role of the teacher in a CLT classroom

As CLT is considered a broad approach to teaching, rather than a specific teaching method, it cannot be found in any textbooks or set of curricular materials. CLT follows the notion of *context of situation*, which consider it as an approach of communicative competence to be used in developing materials and methods that are appropriate to a given context of learning (Savignon, 2007, p. 213). The teacher's role in the CLT classroom is utmost important as they play an essential role in creating real-life situations in order to generate communication. They facilitate the communication process between the students in the class and between students and the text and activities. CLT needs authentic input of language use and requires opportunities for the pupils to use the second language in real-life contexts. This purpose requires highly qualified teachers to manage the creative classroom potential (AbdulRahman, 2015, p. 977).

The teacher serves as a model for correct speech and writing, and helps the pupils to produce error free sentences (J. C. Richards, 2006, p. 5). This is furthermore important as language communicates meaning. In a communicative classroom the teacher will find him/herself to be listening more and talking less, as the pupils are given an increased responsibility to participate. As the pupil's performance is the goal, the teacher functions more as a facilitator for their pupils' learning and should rather step back to observe and if necessary, act as a moderator.

A language teacher needs to be aware of their position as a language model for their pupils.

An essential part of language learning is to expose the pupils to the target language and frequently provide them with linguistic input. This involves the teacher striving to speak the target language as much as possible in the language classroom (Bjørke et al., 2014, p. 27). Hattie and Yates (2014, pp. 274- 275) agree with the above statement as they accentuate a type of social mimicry, they call the chameleon behaviour, which occur when people are in close proximity. This effect may appear in both speech and vocal behaviour, where people, without realising, adjust their voice in order to more closely match the characteristics of the person they are talking or listening to. This may show in terms of speed, tempo, and stress patterns. With this in mind, the choice of language use in a second language classroom do impact the pupils learning outcome.

2.5.2 Communicative Language Teaching for all pupils

Developing a communicative second language classroom is described in the above chapters, like an approach that contributes to increasing the oral communication in the classroom, which furthermore increases their learning outcome. However, there are other considerations for the teacher to make in order for this approach to benefit all pupils. Doqaruni (2014, p. 2) argues that several studies show that a large amount of L2 learners often seem passive and reticent in the language classroom. Hence, encouraging pupils to speak in the classroom is a task many language teachers face on a regular basis.

Reasons like fear of losing face, low proficiency level in the target language, concentration difficulties, lack of comprehension, previous negative experiences with speaking in class and lack of confidence are some of the arguments researchers emphasize regarding pupils reluctance to speak in second language classroom situations (Doqaruni, 2014, p. 2; Ewald, 2007, p. 124). Confidence, motivation, and language ability are three separate, but related learning dimensions in the field of second language. These aspects of language learning unconsciously impact one another, and if one of them decreases or increases the other factors will follow (Doqaruni, 2014, p. 3). Lai (1994, p. 124) asserted three constraints through her research that affected the pupils' involvement in classroom communication. The significant factors were low self-confidence, language anxiety in their L2 and fear of losing face when giving wrong answers. This study was however conducted in a Hong Kong classroom, but as English is one of the official languages in the country it is reasonable to draw parallels to the Norwegian second language classroom. Though English is not an official language, it is a well-established language in this country, which may show resemblance between the Norwegian and Hong Kong pupil.

Ewald (2007, p. 124) further argues that foreign language teaching generates more anxiety among the pupils than in other subjects as they feel that they are presenting "a less positive version of themselves to the world than they normally do" (Ewald, 2007, p. 124). A certain level of anxiety has been proved to increase the language learners' motivation, which further enhances their performance. However, for most pupils the feeling of anxiety contributes negatively to their language learning experience which furthermore influences their language achievement (Ewald, 2007, p. 124). Dörnyei's (2003, p. 12-13) concept of *willingness to communicate*, an extension of research within motivation, is another aspect to consider when teaching second languages in order to include all pupils in the communicative language classroom. This concept comprises several linguistic and psychological variables like linguistic competence, interpersonal motivation, the desire to affiliate with other people, intergroup attitudes, and their personality traits. This implies that there are proficient L2 learners that tend to avoid speaking in class, as well as there are learners that enjoy communicating in their L2 even though their language is less proficient.

This furthermore shows the significant impact these factors have regarding the development of a communicative language classroom, and an aspect the teacher needs to focus on in their teaching. According to Doqaruni's study (2014, p. 13) an instructional methodology that accentuates peer collaboration as a tool to increase the pupils' ability to speak is likely to result in increased confidence. The findings of his study also suggest that the teacher, in a researcher approach, should focus on getting to know their pupils and their attitudes toward oral interaction, in order to discover the underlying reasons for their low confidence and unwillingness to engage in oral activities.

This emphasizes the importance regarding the teacher to aspire to offer the pupils opportunities to practice the target language in a non-threatening and enjoyable context as a positive atmosphere is essential for the success of the activity and their language learning (Banciu & Jireghie, 2012, pp. 96–97).

2.5.3 Challenges with Communicative Language Teaching

For the past thirty years CLT has been perceived as the most applicable and productive approach for teaching English. It has served as an important source of influence on language teaching practice around the world, and this approach has a particularly important role regarding English as a second or foreign language (AbdulRahman, 2015, p. 976; Adnan et al., 2012, p. 306). However, the approach is not solely perceived as an impeccable approach to teaching.

According to Abdul Rahman's study (2015, pp. 978–979) ESL teachers regards four challenges when pursuing to implement CLT in their ESL classroom.

First of all, the teachers stated that the number of pupils needed to decrease in order to facilitate CLT, as group work demands more space and the voice volume provides an uncomfortable work area when several pupils are talking at the same time. Secondly, they requested to undertake ongoing professional development to refresh their experience and increase their self-confidence in regard to this communicative approach. Thirdly, the teachers expressed a need for an effective and efficient assessment instrument, to help them assess the pupil's communicative competence in a local context. They found the assessment challenging as communication, in terms of a conversation between the pupils, is more difficult to assess than for instance a presentation given by an individual pupil. The last challenge in this study were the many misconceptions about CLT that were found among ESL teachers. The teachers assumed CLT meant "no grammar teaching", "only speaking", "pair work, only in terms of roleplay" and an unattainable time-effort from the teacher (AbdulRahman, 2015, pp. 981–982).

As presented in this, and the previous sections, both advantages and disadvantages concerning the approach of CLT are prominent. There are many aspects for the teacher to consider in order to successfully conduct the approach in the second language classroom. Both in terms how they engage the pupils in conversation, and their role as a facilitator in the classroom, but also how they adapt the CLT approach to make sure to include all pupils on every level.

The next sections examine educational resources and more closely investigate the teaching possibilities connected to digital educational resources. A study conducted by Gilje et al. (2016, p. 52) demonstrated that 70 percent of English teachers in upper primary- and lower secondary school, and 40 percent of teachers in the upper secondary school, primarily use the textbook as their main resource in the classrooms. This thesis further delves into how digital educational resources can help to improve the communicative language classroom.

2.6 Educational Resources

In the 20th century people's perception of educational resources was synonymous to the textbook. Textbooks have been a central part of the modern Norwegian school system since its emergence at the end of the 19th century until present day, and is for many viewed as the ultimate educational resource (Gilje, 2017, p. 15). The definition of an educational resource has varied in present time, but the Education Act of 2010 describes it as:

> *All printed and non-printed, as well as digital elements that are developed to be used in educational settings. They may serve as an individual resource or part of a holistic group of resources that alone or collaboratively cover competence aims in the Knowledge Promotion Reform* (Regulations for the Education Act, 2006, paragraph 17.1)[9].

This shows us that according to their definition, resources need to be specifically developed for educational purposes in order to be defined as educational resources and a meaningful tool to apply in the classroom.

Other researchers, however, describe educational resources differently. Hansen (2010, pp. 19–21) bases his research on the Danish science centre within educational resource research, where he separates educational resources into three parts: *didactical resources*, *semantic resources* and *functional resources*. He describes didactical resources as resources made for teaching in a specific subject that involves a deliberate didactic and knowledge content following the subject curriculum, like the textbook of the subject. This correlates with paragraph 17.1 mentioned previously. Semantic resources, on the other hand are described as resources applied in teaching, but not intentionally developed for educational purposes. Like for instance a text, a picture, a board game, or a video relevant for the subject being taught. The final part, functional resources, serve as artefacts and tools that support the didactic- and semantic resources. These resources do not consist of specific content but are developed for students to create something or solve certain tasks, like for instance GeoGebra, board games or Kahoot.

Gilje (2017, p. 19-28) specifies that the purpose of educational resources is to decode subject knowledge into a language that pupils can understand and emphasizes the importance of diversity in choice of teaching methods and educational resources. This for the purpose of facilitating valuable conversations between the teacher and the pupils, as well as among the pupils themselves.

The regulations of the Educational Act[10] (*Regulations for the Education Act*, 2006) show a narrower view of educational resources compared to Hansen (Hansen, 2010, pp. 19–21), in which he includes every educational resource, but divides them into separate groups of resources. This thesis shares Hansen's view in terms of also including educational resources

[9] Author's translation
[10] English translation of the Norwegian Forskrift til Opplæringsloven (author's translation)

that are not deliberately developed for educational purposes, but still serve a purpose in an educational setting.

As the modern society and school system have developed towards a more digital approach to teaching, the availability of digital resources has increased the recent years and provided the teachers with numerous digital options to apply in their teaching. The next chapter will examine the digital aspect of educational resources.

2.7 The advent of digital educational resources into the classroom

The Norwegian Directorate for Education and Training decided early on to implement the use of technology in the Norwegian school, and was the first country in Europe to introduce a curriculum specifying digital skills as one of five basic skills across subjects (Blikstad-Balas, 2015, p. 123). Digital skills became juxtaposed to competence in reading, writing, calculating and oral skills, and all were incorporated as competence aims in the curriculums specified towards each individual subject (NOU, 2003:16, p. 13). During the middle of the 90s the investment in DER in Norwegian schools increased rapidly and has continued until present time, such as plans for new infrastructure, DER courses for the teachers, and development of pedagogic software (Krumsvik, 2007, p. 51). As the use of DER in the schools increased, the need for digital literacy became prominent.

2.7.1 Digital literacy

The development of digital literacy among pupils became prominent when Governments, ministries of education and employers called for the promotion of twenty-first-century skills as creativity and innovation, critical thinking and problem solving, but none the least digital literacies. The purpose of developing digital literacy among the pupils was to prepare them for their future employments (Dudeney et al., 2013, p. 2). Digital literacy involves that the pupils develop the individual and social skills that are needed for them to effectively interpret, manage, share and create meaning in the expanding range of digital communication channels (Dudeney et al., 2013, p. 2). The term digital literacy, or digital skills, as defined in the five basic skills in the Norwegian school curricula (Norwegian Directorate for Education and Training, 2012, p. 5), is a relative concept, dependent on time and context. What this term implies is highly disputed and has in recent times been expanded to cover several areas. Payton and Hague (2010) concisely explain that the proficiency in digital literacy is to:

> Have access to a broad range of practices and cultural resources that you are able to apply to digital tools. It is the ability to make and share meaning in different modes and formats; to create, collaborate and communicate effectively and to understand how and when digital technologies can best be used to support these processes. (Payton & Hague, 2010, p. 2)

This shows the extensive requirements pupils and teachers need to hold, in order to be qualified as digitally literate. It is not enough only to know *how* to use digital technologies, but more importantly *when* and *why* they are appropriate to use, and *what* to use them for, in order for DER to be a supportive element (Payton & Hague, 2010, p. 19).

The challenges within digital literacy concerns how to make learning meaningful with the use of DER. As digital skills are implemented as one of the five basic skills in the Norwegian curriculum (Norwegian Directorate for Education and Training, 2012, p. 12) and our society depends on knowledge within technology, teachers have no other choice than to welcome it into their classroom and implement DER in their teaching in every subject. With this in mind, digital literacy is also an essential proficiency for all teachers. Teachers are ideally expected to help their pupils develop their digital literacy, which makes it equally important that the teachers have developed their own digital literacy or Professional Digital Competence (PDC) in subjects of the curriculum and address the changing nature of subject knowledge (Røkenes, 2019, p. 163). Digital resources have become a supplement to traditional books, which oblige the teachers to acknowledge that the pupils of today need different kinds of skills, knowledge and understanding for the purpose of developing expertise in their subjects (Payton & Hague, 2010, pp. 11-12).

2.8 Digital Educational Resources

In the past twenty years, the amount of educational resources has continued to advance, and the selection and complexity of these resources has increased. Digital educational resources (DER) have continued to support and partially replace the standardized textbook in the classroom (Gilje et al., 2016, p. 17). The use of DER previously referred to computers or computer software and mechanisms that were still not mainstream. However, today DER have reached the forefront of educational discourse mainly as a result of the availability and selection of new, primarily digital devices, as well as the introduction of governmental requirements for learning how to apply them in the classroom (Mishra & Koehler, 2006, p. 1023). These new technologies consist of computers, educational games and the myriad of applications provided by the

internet. Considering the rapid development of today's technology both DER and in the society in general it is an interesting thought that for the first time, teachers and parents have barely, if any experience with the resources that their children are going to use on a daily basis in their lives as adults (OECD, 2015, p. 186).

The term *digital educational resource* is one of many names that describe the many digital tools and resources that are available for school practice. This term functions as an umbrella term for all digital tools, devices and software that contribute to improving learning, such as laptops, interactive whiteboards, cell phones and software like Kahoot, eTwinning, Padlet etc. As previously mentioned, Hansen (2010, pp. 19-21) divides educational resources into four categories, where he connects DER as functional resources. He defines functional resources as technologies that facilitate and support the pupils' processes of learning, like resources to learn *with*. Hansen further states that functional resources incorporate into classroom processes and activities and are characterized by three specific conditions. Firstly, the technology: *what can it do?* Secondly, the activity: *what do we use the technology for?* Thirdly, the purpose: *what is the intention behind what we do?* (Hansen, 2010, p. 67). In other words, the important aspect of functional resources is not the technology itself, but the activity or process the technology is a part of. For example, if a laptop were to be described as functional resource, it is not sufficient to just describe the technological qualities and what we can use it for, like typing, voice recording, show videos or play games. The essential information is how we use the laptop in a specific teaching activity to mediate in the pupils' learning processes.

Regarding ESL teaching, Røkenes and Krumsvik (2016, p. 4) highlight the use of DER, or functional resources, as they consider it an effective tool for learning and teaching because it provides access and exposure to authentic language material, communication opportunities and classroom integration. Their study also indicates that computer- and video assisted pronunciation training may improve pupils' language skills in terms of expanding their vocabulary, improving grammar and pronunciation and increase their language production and complexity (Røkenes & Krumsvik, 2016, p. 4).

2.8.1 Accessibility and employment of DER

The use of DER in the Norwegian classrooms has progressively increased the past years. The results from the research organization SINTEF's (Fjørtoft, Thun, & Buvik, 2019, p. 60) *2019 Monitor survey* demonstrate that the number of teachers using digital resources in the classroom more than nine hours per week has increased from 13.5 percent in 2016 to 36.7 percent in 2019.

Additionally, the study also shows that in 2016 the number of teachers that used digital resources less than four hours per week has declined from 61.7 percent to 20.7 percent in 2019. However, it is worth mentioning that the percentages demonstrate the amount of hours teachers use in total in all subjects, not only in the English subject.

The amount and type of digital resources each school offer their pupils depends on the school administration and the economy of the school's county. Hence, these factors affect the teachers' possibilities for implementing digital resources in their teaching. Nonetheless, the *2019 Monitor survey* (Fjørtoft et al., 2019, p. 24) reveals that 32.1 % of fourth grade pupils have access to their own computer or tablet in school, 55.5% of seventh grade pupils and 82.5% of ninth grade pupils have the same possibility. Respectively, 64.7% of fourth graders, 42.0% of seventh graders and 14.9% of ninth graders reply that they share computer or tablet with another pupil. These numbers demonstrate that in order to implement DER in the CLT classrooms, the access of DER is not a significant issue for the older pupils, instead it depends on the teacher's personal digital literacy. However, the younger the pupils are, the less DER are available, which makes it difficult to follow the national guidelines concerning the development of digital skills.

The numbers presented in SINTEF's survey focus on presenting the coverage of DER in lower- and upper primary level, but it does not investigate how teachers actually use DER. This thesis will investigate this aspect.

2.8.2 Challenges concerning incorporation of DER

Mishra and Koehler (2006, p. 1023) endorse new technologies and state that they have changed the nature of the classroom or have the potential to do so. However, despite the critical role DER have been endorsed with, the implementation of DER in the classroom has still met some obstacles.

Gilje (2017, p. 105) states that the use of DER can be distracting for the pupils and draw their attention away from the teaching towards the screen. This particularly happens in subjects where the pupils lack motivation and a sense of achievement. He further refers to his review of 56 studies where the majority pointed towards a negative coherence between cellphone use and learning. Another issue is teachers who are reluctant to embrace new technologies in their teaching. Reasons such as fear of change and lack of time and support are emphasised as the main problems (Mishra & Koehler, 2006, pp. 1023–1024). However, the fact that DER have entered the schools and are here to stay makes it necessary for all teachers to face their

reluctance towards DER and develop along with the new digital resources, instead of working against them. The evolution of new DER is rapid, compared to the more standardized and stable development of conventional educational resources, such as textbooks. Consequently, teachers will have to update themselves on newly available DER, but also revise new technologies and skills as the currently available DER becomes obsolete (Mishra & Koehler, 2006, pp. 1023–1024).

2.9 Meaningful learning with Digital Educational Resources

Digital educational resources have entered the education system and there seems to be no way back. The question now is not whether to implement them in the classroom or not, but how to do so. Mishra and Koehler (2006, p. 1018) argue that part of the problem is that there has been a tendency to only look at the technology and not to consider how it is used, and highlight that to simply introduce technology to the educational process is far from sufficient to expect the teacher to actually use it.

The important question is now what knowledge the teachers need to encounter, in order to appropriately incorporate technology into their teaching. Howland, Jonassen and Marra (2014, p. 2) encourage teachers to engage their pupils in meaningful learning, which involves that the task the pupils pursue should engage active, constructive, intentional, authentic, and cooperative activities. Instead of testing inert knowledge, the school should assist the pupils to learn "how to recognize and solve problems, comprehend new phenomena, construct mental models of those phenomena, and, given a new situation, set goals and regulate their own learning" (Howland et al., 2014, p. 2).

They argue that digital educational resources can support this process, but emphasize that the focus on DER needs to change from *technology-as-teacher* to *technology-as-partner* in order to create meaningful learning with DER. In other words, pupils must learn *with* technology rather than *from* technology (Howland et al., 2014, pp. 5–7). When learning with digital educational resources the DER is used as engagers and facilitators for thinking, to support productive thinking and meaning making by the pupils. As opposed to learning from DER, which concerns delivery of information through for example a PowerPoint presentation, with no participation from the pupils (Howland et al., 2014, p. 7).

The OECD report from 2015 agrees with Howland et. al concerning the aspect of learning with DER. It states how important it is that the pupils are able to navigate through a complex digital landscape in order to be able to participate in the social, cultural and economic life around them.

(2015, pp. 3-4). However, their main concern also involves the need for a clear pedagogic approach for teachers to follow, as they state that "technology can amplify great teaching, but great technology cannot replace poor teaching" (OECD, 2015, p. 4). The need for research on how to implement DER in the classroom is still necessary, but the next section presents a model that can help the teachers in this matter.

2.9.1 TPACK- The model of Technological Pedagogical and Content Knowledge

Mishra and Koehler (2006, p. 1020) articulated the Technological Pedagogical and Content Knowledge model (TPACK) to illustrate the competencies the teacher needs in order to integrate DER into teacher instruction. Their aim was to help teachers understand how to meaningfully integrate DER in the classroom by developing a visual framework. The TPACK model shows how the three knowledge areas technology, pedagogy and content are connected and interact with one another. They are in a symbiotic relationship to each other, in which this model highlights the complex interplay of the three areas of knowledge. This further demonstrates that the model encourages teachers to avoid teaching technology in isolation, but rather try to explore how the three knowledge areas in combination can contribute to increase the pupils understanding of the content (Mishra & Koehler, 2006, pp. 1025-1029).

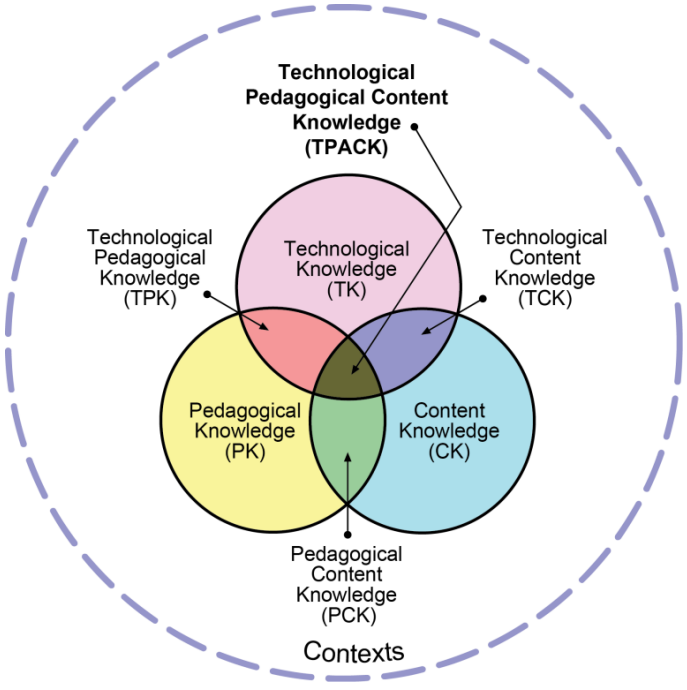


Figure 2. The TPACK model (from http://tpack.org/)

The content knowledge involves what the teacher is teaching their pupils, the actual subject matter. The pedagogical knowledge concerns knowledge about which techniques or methods

that should be used in the classroom, like CLT in regard to this thesis. The last knowledge area, Technological knowledge, involves the skills needed in order to operate standard- and more advanced technology, as well as the ability to adapt to new developed technologies (Mishra & Koehler, 2006, pp. 1026–1028). The technology used by the participants in this thesis are presented in the analysis chapter.

TPACK is described as "the basis of good teaching with technology" (Mishra & Koehler, 2006, p. 1029), but it is emphasized that there does not exist one single technological solution that applies for every teacher, every subject or every view of teaching. It is necessary to develop a nuanced understanding of the interplay between content, pedagogy and technology in order to create quality teaching, as appropriate, context-specific strategies and representations (Mishra & Koehler, 2006, p. 1029).

2.10 CLT in the ESL classroom

The CLT approach, according to Savignon (2007, p. 208), is viewed as one of the most recognized approaches within language learning, but despite its recognition the search for relevant previous research in the field of CLT in an ESL context proved to be challenging, especially in a Norwegian school setting. Aksnes (2016, p. 16) argues that the notion of oral skills has received far less attention than the focus on reading and writing. The research in the field appears to be dominated by studies conducted in Asian countries, especially in countries where ESL teaching is often characterized by a monologic teaching standard with limited interaction between the pupils and teacher (Lee, 2016, p. 280). Several of the studies examined presented quite negative experiences with CLT, and it seemed to be perceived as a challenging teaching approach in Asian school systems.

It is reasonable to assume that to Asian teachers and pupils the monologic teaching standard and the communicative teaching approach are too contradictory, and hence require extensive time to acquire. The studies themselves are interesting, but due to the differences in the socio-cultural context between this study and the Asian equivalents, the results of these studies are inadequate to interpret in a Nordic context. This is partly because English serves as a second language in Norway, rather than a foreign language, where we study the language already in first year of school and are regularly exposed to the language through various media. However, a couple studies will be presented here as they offer some useful reflections related to my own study. Additionally, two Norwegian studies partly related to this current study are presented. One of them demonstrates the perspective on oral communication in a Norwegian context,

though in the Norwegian subject. The last study in this section involves a study in a Norwegian EFL classroom working with readers theatre, a different way of working with oral skills than the current study, as well as reading skills, but which still resembles some of the aspects in CLT.

Lee's (2016, pp. 279-293) study was conducted in Singaporean primary schools where they conducted an intervention study to extend the pupils talk through dialogic teaching, which is a similar approach to CLT. The Singaporean students ranked at the top of international education ranking systems but did not manage to express their opinions and take part in a discussion at their work. Lee claims that it is partly a result of the monologic teaching standard, where the teacher lectures and the students neither interact with the teacher or with each other. The monologic approach to teaching seemed to restrict the pupils in becoming active contributors, capable of critical and creative thinking, as well as develop the teamwork and effective communication desired for today's workforce. With relevance to this study it is interesting that the analysis of classroom interactions showed that when the pupils were asked to elaborate on a topic with explanation or evidence by building on knowledge from their classmates, teacher-pupil talk was extended, and the pupils demonstrated a stronger engagement with learning.

Rahman, Singh and Pandian (2018, pp. 295-310) conducted a case study in two schools in Bangladesh where they examined the ESL teachers' relationship between teacher beliefs and observed classroom practices within the principles of CLT. The CLT approach was introduced at the secondary level in 1996, which demonstrates that they should have been practicing this for years and acquired the way of teaching. The study further demonstrates that the teachers' experience with CLT regarded form- and focus oriented teaching and communicative work both written and spoken, in pairs and groups, all in line with CLT theory. However, the study indicates that the teachers' experience with CLT did not reflect in their ESL teaching, where the communicative focus was often degraded due to exam preparations in terms of written work, which is similar to how Aksnes (2016, p. 16) describes the focus on oral skills in Norwegian schools. Additionally, the participating teachers, unlike CLT theory, continuously focused on error correction as they feared that error without correction could lead to fossilization. It is interesting how the teachers' beliefs and practice do not correlate, which is a possible occurrence for the participants of my study as well.

Svenkerud, Klette and Hertzberg (2012, pp. 35–49) conducted a study where they examined data material from the Pisa+ study, which contains video recording from six 9th grade classroom

in Norway. Their intention was to get an overview of how much and how oral skills are practiced in the classrooms in the subject of Norwegian. The Pisa+ data material shows that oral skills are only practiced about 20 % of the total amount of Norwegian lessons. Furthermore, of the 20 % oral practice, 84 % of this time is spent preparing or having oral presentations, whereas only 9,6 % is spent on meta-teaching and discussions or debates. This shows that despite the focus on practicing oral skills in terms oral interaction in the national curriculum (Norwegian Directorate for Education and Training, 2012, p. 6) the actual practice aims towards presentation practice. The authors state that this might be because of how the oral exams are structured, hence teachers focus on preparing their pupils for this assessment situation. Even though this study is conducted in a Norwegian subject classroom it is still interesting for this current study as it illustrates practice of oral skills in a Norwegian context. There are possibly similarities between how oral interactions are practiced in the Norwegian subject and in the ESL classroom, even though Norwegian is taught as a first language. The general message of Svenkerud, Klette and Hertzberg's study is that the practice of oral skills needs to increase and change towards a more communicative approach rather than presentation focused, which aligns with the notion of CLT.

Drew and Myrseth (2016, p. 49-66) conducted a study in a sixth grade EFL class in Norway, where they examined how readers theatre (RT) influenced the pupils' reading, motivation and confidence. Additionally, they were interested in the teachers and pupils experience with RT. In short, the pupils initially rehearsed their segment of the text together with their group. Then they received feedback on pronunciation and assistance with comprehension by their teacher. Finally, they performed their texts in front of the class. The results of this study show that the RT project managed to develop the reading skills of the EFL learners through reducing their number of mispronounced and wrongly recognized words, as well as improving their fluency. It further had a positive influence on their motivation to read on their own and they experienced an improvement of their vocabulary.

The relevance of Drew and Myrseth's study regarding my research project is possibly not that obvious, but Drew and Myrseth (2016, p. 50) emphasise that RT is a method that incorporates both written and oral language with an authentic communicative purpose. The authentic and communicative approach corresponds with the aspects of CLT. Moreover, this study is conducted in a Norwegian EFL context, where pupils are trained in basic skills of reading and

oral language. So, in short, Drew and Myrseth's study focus on the ability of reading aloud in the classroom, while my study focuses on out loud communication in the classroom, which I consider as two different, but corresponding aspects of the overall proficiency in oral skills.

In summary, the presented previous studies have demonstrated that increased communication, through discussion with classmates, improved the teacher-pupil talk. Further, it was shown that the teachers' experience with CLT did not necessarily translate in to their teaching practice, and that the time spent on oral practice, according to the Pisa+ study, in a selection of Norwegian classrooms was primarily spent on having oral presentations. Finally, the use of RT in the EFL classroom showed improvement in the pupils' fluency and reduced their mispronunciation.

2.11 DER as a supportive element in the facilitation of CLT in the ESL classroom

As this study investigates how DER functions as a supportive element in the ESL classroom for the facilitation of CLT, it is relevant to review how other studies perceive this matter. The current thesis mainly focuses on the aspect of CLT and teachers' exploitation of DER in general, rather than one specific resource. However, as it proved to be challenging to find previous studies on the exact same topic as this study, some of the studies presented below focus on one specific DER, instead of a general view like this study. Additionally, some of the studies also examine the aspect of dialogic teaching, rather than CLT. Dialogic teaching resembles CLT as both foster pupils' engagement and considers communication and pupils' interaction as crucial for second language learning, and for this reason these studies are relevant to examine. Studies conducted by researcher Sara Hennessy are primarily represented in this section. Preferably, there should be a wider selection of researchers, but she seems to be the one with the most expertise in the field of DER and CLT. Following, the gathered studies are presented.

Hennessy, Mercer and Warwick (2010, pp. 195–209) conducted a study in which they examined, mainly in UK schools, how interactive whiteboards (IWBs) can be used to support and enhance classroom learning through dialogic teaching. They particularly focused on how teachers can utilize the technical interactivity of IWBs to support dialogic interactivity. The researchers followed three teachers that used an IWB as an integrated part of their daily practice, and the teachers were encouraged to discover methods in which the functionalities of IWBs were exploited from a pedagogic perspective, rather than only the technological perspective. The study found that the use of IWBs allowed the teachers a flexibility in the development of

interesting, multimodal stimuli for whole-class dialogue. However, the researchers conclude that the possibilities made available through the use of IWBs are restricted by the teachers' pedagogy and digital literacy.

In another study, Hennessy (2011, pp. 463-489) explores how the IWB can be used to support pupil's learning through classroom dialogue. The study defines classroom dialogue in the context of IWBs as a co-operation between teachers and learners to construct digitally represented knowledge. A theoretical framework is developed in order to understand the notion of classroom dialogue, and the mediating role of artefacts used in interaction with IWBs. The study primarily builds on research conducted in the UK and analyses of classroom observations of teachers using IWBs to support teaching and learning. It states that IWBs can support the established dialogic pedagogy and open opportunities for rich, new, multimodal forms of dialogue.

Hennessy and London (2013, pp. 5–24) outlined a number of teachers' strategies and experiences with IWBs. They have based their article on published research concerning international teachers experience with the IWB. The article evaluates the features of the IWB and displays a list of specific suggestions for how the IWB can be implemented in the classroom to foster more interactive and dialogic pedagogical approaches. The study argues that the IWB can be used for whole class teaching as well as for teaching of smaller groups. The article concludes that the technology itself has no transformative power and emphasises that the most important aspect in determining the gain from the use of IWBs depends on the teacher's digital literacy and professional knowledge as a mediating role between the pupils and the IWB.

The studies presented above all emphasise the IWB as a beneficial resource to support the pupils' development of communication. However, it was emphasised that it is not the IWB itself, but the teachers' professional development and digital literacy that determines the pupils' learning outcomes.

The previous studies presented in the previous and this section (section 2.10 and 2.11) show resemblance to the current study. However, the limited study on the field of CLT in the ESL classroom, especially in a Norwegian school context, and moreover the even less examined topic of DER as a supportive element of CLT demonstrate that there is a research gap in this field, which my study possible can contribute to.

2.12 Chapter summary

This chapter has presented relevant theory concerning oral interaction, concentrating on theory about the CLT approach, and communicative competence which is closely linked to CLT. As this study examines how DER can support the facilitation of CLT, theory on educational resources and DER is presented. Additionally, I have addressed the integration of meaningful use of DER in the classroom, where the TPACK framework is presented as a specific model to assist teachers in the implementation of DER in their teaching. Finally, previous research relevant for this study is presented.

3. Methodology

Methodology within the field of social science concerns a process of collecting information about the social reality, and analysing and interpreting the empirical material (Johannessen, Tufte, & Christoffersen, 2016, p. 25). The researchers seek to investigate whether their assumptions correspond with the reality, and this type of research is characterized as transparent, systematic and thorough with the help of detailed documentation (Christoffersen & Johannessen, 2012, p. 16). The choice of research method impacts the collected data that I, as the researcher, have collected and this is therefore highly relevant during the whole research process. The following chapter focuses on the design of the research project. It presents aspects concerning the choice of research design, focusing on the qualitative research method. Then, it addresses the process of data collection and methods of analysis. Furthermore, the considerations taken concerning the quality of the study is presented, and the discussion of ethical considerations is included at the end of the chapter.

3.1 Research design

In all empirical research it is fundamental to choose a research design that is suitable to adequately answer the research question (Postholm & Jacobsen, 2018, p. 61). Research design may be described as everything that relates to the research. According to Postholm & Jacobsen (2018, p. 85) there does not exist a perfect research design for any project as each one has individual advantages and disadvantages. Based on your research questions you choose the best suitable research design in order to enlighten the topic you are interested in. As this research investigates how English second language teachers implement digital educational resources in the ESL classroom to facilitate for Communicative Language Teaching, a qualitative research design was chosen. Early in the qualitative research process it is necessary to determine *what*, and *who* you want to study and *how* you want the research to be conducted (Creswell, 1998, p. 17; Johannessen et al., 2016, p. 69). The *what* aspect was mainly described in the introduction section, whereas this chapter will investigate the *who* and *how* aspects of the research.

3.1.1 Qualitative research design

Research methods can practically be divided in two sections: Quantitative- and Qualitative research methods. Data material related to quantitative research methods are conveyed using numbers, where social phenomena are converted into numerical sizes that can be examined using statistical analysis. Surveys are the most common method for this type of research, which gives the researcher the possibility to collect data from practically thousands of people

(Postholm & Jacobsen, 2018, p. 89). The surveys are intended to systematically describe the facts and characteristics of a given phenomenon or the relationships between events and phenomena (Merriam, 2009, p. 5).

In qualitative research methods however, the researcher collects data about a phenomenon through words and language. Creswell (1998, p. 15) underlines a key difference between the two research methods, where he states that quantitative researchers work with a few variables and many cases, compared to qualitative researchers who work with a few cases and many variables. The qualitative researchers are interested in understanding how people interpret their experiences, how they construct their worlds and what meaning they attribute to their experiences (Merriam, 2009, p. 5). For example, a survey could easily be conducted to reveal how many fifth-grade pupils struggle with their English homework, but qualitative researchers are more interested in finding out why the pupils are struggling, what it makes them feel, if and how they receive any help from teachers and/or parents and so on. The focus is on understanding the pupils' experience of the phenomenon.

A third alternative for research methods is a combination of qualitative and quantitative research methods, addressed as mixed methods. This means that the researcher attempts to view the phenomena from an even wider range of perspectives, which can enrich the results in ways that a single form of data does not support (Hanson et al., 2005). The researcher gets the opportunity to test different methods in order to check if any of them show similar results and this process allows them to simultaneously generalize results from a sample to a population for the purpose of obtaining a profound understanding of the phenomenon of interest. This can furthermore increase the results' credibility (Hanson et al., 2005; Johannessen et al., 2016, p. 367).

Van Maanen (1979, p. 520) describes qualitative research as "an umbrella term covering an array of interpretive techniques which seek to describe, decode, translate, and otherwise come to terms with the meaning, not the frequency, of certain more or less naturally occurring phenomena in the social world". In other words, as this thesis seeks to explore three English teachers experience of how digital educational resources may help to facilitate for Communicative Language Teaching, a qualitative research design serves the purpose of enlightening this topic. Qualitative research, described as an *umbrella term,* illustrate the

multiple possibilities of research methods within this field, and writers of qualitative texts have "organized the diversity of forms of qualitative research in various ways" (Merriam, 2009, p. 21). For instance, Creswell (1998) presents five approaches to qualitative research design – narrative research, phenomenology, grounded theory, ethnography and case study. The latter one being the research method chosen for this thesis.

3.1.2 Case study

Yin (1994, p. 13) describes case studies as "an empirical inquiry that investigates a contemporary phenomenon within its real-life context, especially when the boundaries between phenomenon and context are not clearly evident". Case studies may be understood as a collective term for a variety of research designs that all study a *case* (Postholm & Jacobsen, 2018, p. 63). The case, also defined as a *bounded system*, is bounded by time and place, and the case itself is the main focus, which may be an event, an activity or an individual (Creswell, 1998, p. 61). Creswell (2007, p. 74) divides case studies into three categories: *Instrumental Case Studies*, *Collective Case Studies* and *Intrinsic Case Studies*.

Regarding this project the collective case study is the most adequate as it involves examining several cases in order to study a phenomenon (Thagaard, 2013, p. 56). The three teachers that serve as participants for this research project represent the three cases for this study, while the research question is the phenomenon being investigated. The use of multiple-case study enables the study to cross-case analyse the data and the possibility of generalizability increases slightly as the number of cases raise. Each case will contribute different perspectives on the research question (Johannessen et al., 2016, p. 207).

In order to conduct a successful case study Yin (1994, pp. 20–25) demonstrates five components of the research design that are especially important and may serve as a framework for this research process. They are as follows:

1. The outline of the study's research question
2. The study's propositions or purpose
3. The unit(s) of analysis
4. The logic linking the data to the propositions
5. The criteria for interpreting the findings

Yin (1994, pp. 3–4) further emphasizes three strategies necessary to consider when designing a case study: *Exploratory*-, *Explanatory*- and *Descriptive Case Study*. They differ in the way

empirical evidence is collected and analysed, but it is also important to keep in mind that the boundaries between them are not clear and sharp. They overlap to some extent and it may be difficult to choose which one to use. However, for this study the explanatory research strategy is the most adequate as the study examines the "how" question and deals with operational links that need to be traced over time, rather than frequencies. In this case the three teachers that will be introduced in section 3.2.1.

A distinctive feature of case studies is that they require extensive data collection consisting of multiple sources of information such as observations, interviews, documents, and audio-visual materials. In order to be able to conduct an in-depth study on a small amount of cases, it is necessary to collect data that can answer the research question from different perspectives (Creswell, 1998, pp. 62–63) The chosen data collection methods for this thesis will be outlined below.

3.2 Collecting data

Data is described by Merriam (2009, p. 85) as "nothing more than ordinary bits and pieces of information found in the environment. They can be concrete and measurable, as in class attendance, or invisible and difficult to measure, as in feelings". It merely depends on the researcher's interest and perspective whether the received information becomes data or not. As previously mentioned, case studies require extensive data collection in order to do an in-depth description and analysis of a bounded system (Merriam, 2009, p. 61).

A major strength of case study data collection, as well as mixed methods research, is the possibility to use multiple sources of evidence, which makes data triangulation a suitable strategy. This strategy requires evidence from two or more sources, that converge on the same set of findings, giving *converging lines of inquiry*. Triangulation makes the study more convincing and accurate, and increases the credibility of the study (Yin, 1994, pp. 78–92). For instance, according to Postholm & Jacobsen (2018, p. 114) observation, as the researcher's subjective interpretation of a phenomena, is not sufficient if solely used as the data collection method. It is necessary to consider the participants thoughts additionally to the researcher's interpretation and assumptions. This study has followed the principles of triangulation in terms of the use of field notes from classroom observation, interview transcripts and reflection logs as methods for the data collection.

3.2.1 Study participants and research context

When the topic for the study was decided, the next step was to decide upon and find research participants. The study's focus generates on how DER can support the facilitation of CLT in the ESL classroom, hence I was interested in ESL teachers, preferably with experience in using DER in their ESL teaching on a regular basis. I was interested in observing their ordinary ESL lessons without providing them with a specific lesson plan to follow, though it was emphasised in the information document that I was especially interested in observing practice of oral communication and interaction.

Due to my limited professional network as I have yet not started working in the school system, and the fact that teachers in general are busy and often difficult to employ for projects like this, I decided to use the sample strategy *convenience sample*. This strategy involves, as the name implies, that participants are collected by convenience. With some assistance from my supervisor, I emailed several school principals a detailed information document (see appendix B) about the study and received several positive responses from a variety of teachers. Merriam (2009, p. 79) indicates that the use of convenience sampling is often less credible and likely to produce "information-poor" cases, rather than "information-rich" cases. This was however, the most appropriate strategy for me based on the circumstances. Though exciting to see who volunteered to participate.

I thought it to be important that the teachers volunteered freely and felt qualified and motivated to participate. As this research project required time and effort on their behalf in their already busy life as teachers, it was important to convey that the choice of participating was out of their own free will. The teachers that replied and wanted to participate were selected based on their experience with digital technology, but also due to practical and economic reasons, like geographical locations in Norway. It was preferable that I was not acquainted with the teachers beforehand, in order to minimize preconceptions and research bias. Following is a brief description of the three participants. For the purpose of personalizing the participants they are given a pseudonym.

> **Teacher 1 Hilde:** This participant is a female teacher, teaching in primary school. She has worked as a teacher for almost twenty-two years, since 1997. She has fourteen years of experience from lower secondary school level and the remaining years from primary school level. She describes her digital experience at a beginner level, where she uses the digital board to show pictures or to search the internet. She has noticed that her pupils

enjoy the use of smartboard in her classes and she aim to use it regularly in order to engage her pupils even more. Moreover, she emphasizes that as a participant in this master study she has become more aware of the accessible possibilities when it comes to digital technologies in the classroom.

Teacher 2 Kari: The second participant is a relatively newly qualified female teacher. She has worked as an English teacher for two years at a lower secondary school level. Concerning her digital experience, she says that she prefers to run her classes as technologically as possible for the purpose of preparing her students to take part in a digital world. She also emphasises that she has a lot of digital experience from her own schooling, where her school participated in research projects focusing on technology in the classroom.

Teacher 3 Marit: The third participant teaches at an upper secondary school level. She has taught six years in total, where the three first years were a part time job next to her teacher training. The remaining three years has been a fulltime job as an English- and Social Science teacher. She explains that she seeks to integrate digital technologies as a natural part of her teaching and that she enjoys trying out new ways of teaching. As a teacher in secondary school she considers that digital technologies should be viewed as an opportunity rather than an obstacle in the classroom. Because phones, computers and tablets have become a big part of her pupil's everyday life and accordingly, the school should follow.

3.2.2 Observation

Observation as a research method requires a significant time effort from the researcher, but it is particularly suitable when the researcher is interested in direct access to interaction and communication between the participants. The researcher uses all senses in order to observe the phenomena in depth. Observation often gives access to information that is difficult to receive through interviews as visual information appeals stronger to our cognitive senses than spoken information (Johannessen et al., 2016, pp. 118–121).

A specific feature concerning observations is its presence in the setting where the phenomenon of interest naturally occurs, rather than a location designated for the purpose of interviewing. Additionally, observational data represent a first-hand encounter with the phenomenon (Merriam, 2009, p. 117). In our everyday life we find ourselves in natural settings where we

automatically observe the surroundings and people around us. However, research observation differs in terms of its systematic focus, where it addresses a specific research question and is expected to present trustworthy results (Merriam, 2009, p. 118; Postholm & Jacobsen, 2018, p. 114).

There is a large variety in how to conduct observations, and different researchers have presented different features and stances for different procedures. Gold (Denzin & Gold, 2018, pp. 219–222) previously presented a spectrum of four possible stances. The complete observer is hidden from the group being observed either behind a one-way mirror or by observing in a completely public setting, whereas an observer- as-participant may be present for the group being observed but does not participate in the activities conducted. The participant-as-observer focuses primarily on the role as observer but may participate to some degree in the activities in the classroom. The full participant, however, serves as a member of the group being observed and keeps his or her observer role hidden for the group being observed, in order to not disrupt the natural activity.

Shortly after contact was established with the participants and they had agreed to the terms of this project, we decided on individual time schedules for when I could participate in their classrooms as a silent observer. It was highly important to me that I followed the natural schedule of their teaching and did not want the participants to change their timetables and/or the lesson contents because of my presence. My main interest was to be present in lessons with focus on oral activity, as well as the use of digital technology. Except for these two requirements it was up to the teachers to decide how and what they wanted to do in their English lessons. The pupils were given a short introduction to me and my research project and were given the opportunity to ask me questions. However, as my focus was on their teachers and not the pupils themselves, I encouraged the pupils to pretend that I was not present and act as they normally would do in the classroom.

For this study it was necessary for me to be as invisible as possible, in order not to influence the pupils and/or teachers in any direction. I was interested in their natural communication with minimal impact from my presence. As it is not possible to disguise behind a one-way mirror in a regular Norwegian classroom, observer-as-participant became the natural choice for this study, where I sat in the back of the classroom and carried out an audio recording and wrote down field notes.

Field notes are a necessity in studies where the researcher serves as an observer-as-participant in the research field. Writing field notes helps the researcher to remember and process all the impressions, which further on will be valuable data for the analytical process (Thagaard, 2013, p. 89). For this study it was highly relevant with extensive field notes as I followed several teachers for numerous classes. I conducted a form inspired by Postholm (2010, p. 63). The form was vertically divided in two sections. In the left column I wrote specific observations and dialogues that occurred in the classroom, while in the right column my immediate interpretation and analyses of certain events was quickly written down (see appendix D). All notes were carefully marked with date and the participant's pseudonym in order to keep them organized.

Subsequently, for each observation session, descriptive reflection notes were written, based on Merriam's (2009, pp. 128-131) ideas about observation recording. Reflective comments may include the researcher's reactions, feelings, initial interpretations, and speculations, as well as detailed descriptions of the situation observed. These were written shortly after the observation had ended, in order for the memories to be fresh in mind.

3.2.3 Interview

Interviews are defined as "a process in which a researcher and participant engage in a conversation focused on questions related to a research study" (DeMarrais, K. & Lapan, 2004, p. 54). Interviews are usually conducted person-to-person, but may also be operated in groups, where the primary difference between a conversation and an interview is that an interview seeks to obtain a special kind of information (Merriam, 2009, p. 88). The quality of interviews as a research method are that they give comprehensive and detailed information about how people experience their life situation, and their personal thoughts and perspectives about the interview's topic. It is necessary to conduct interviews when we do not have the possibility to observe behaviour, experiences and feelings, as well as how people interpret the world around them (Merriam, 2009, p. 88; Thagaard, 2013, p. 95). To implement a successful interview the interviewer is required to possess a versatile set of skills. Kvale and Brinkmann (2009, pp. 98–111) emphasise that the interviewer's competence is based on a combination of personal proficiency, curricular expertise and his/her understanding of social relations.

Regarding the case study of this master thesis, Yin (1994, p. 84-85) considers interviews as one of the most essential sources of case study information because most of the studies concerns human affairs, like a specific person, situation or institution. There are various forms of interviews, like *structured interviews*, which entails a premade interview guide where the order

of the questions is already established. This type of interview is applicable when the researcher is interested in comparing the answers (Thagaard, 2013, pp. 97–98). At the other end of the spectrum *unstructured* and informal interviews are common. These are commonly more spontaneous and like a normal conversation, where the researcher constructs the questions during the conversation with the interviewees. These interviews are particularly useful when the researcher lacks knowledge about a phenomenon in order to ask relevant questions (Merriam, 2009, p. 89-90; Thagaard, 2013, p. 97). There are benefits and disadvantages to them both, as a rigidly structured interview might overlook important aspects of the phenomenon, whereas the unstructured interview requires a skilled researcher in order to supervise the seemingly unconnected pieces of information.

The interview chosen for this thesis is the *semi-structured interview*, which is also the most commonly used qualitative interview (Johannessen et al., 2016, p. 139). The advantages of this type of interview are that it combines the structured interview guide, and at the same time gives the researcher the possibility to follow up the interviewees answers and create new questions based on the conversation (Merriam, 2009, p. 90). An interview guide was created in order to get in-depth information about how the individual teacher implement digital educational resources in order to facilitate for communicative language teaching in the ESL classroom (see appendix C). I was however, prepared to make small changes or supplements during the interviews if relevant. The interviews were intentionally conducted in Norwegian for the purpose of limiting possible misunderstandings and ambiguity, along with providing a comfortable interview situation for the participants.

The interview guide was inspired by Johannessen et al.'s (2016, p. 141) interview recommendations, where they accentuate seven types of question that plays an important part in an interview. They are:

- Introduction of researcher and project
- Short answers questions
- Introduction questions
- Transition questions
- Key questions
- Complicated and/or sensitive questions
- Termination

There were many considerations to make when designing the interview guide, especially which questions to ask. Kvale and Brinkmann (2009, p. 128) describes the first few minutes of an interview as decisive as this is the time where the interviewees receive their first impression of the interviewer. A respectful and reliable contact is essential for the interviewees to feel comfortable enough to talk freely and expose their feelings and experiences to a stranger. The participants of this thesis were given a thorough presentation of the project and the particular interview, their anonymity, and information about the possibility to withdraw if they were to change their minds. They were also asked to confirm the use of an audio recorder and given the chance to ask any questions before the start.

In correspondence with the proportion of this project the interview guide was confined to five parts. The three middle parts were questions derived from a combination of my personal preconceptions, relevant theories, as well as some were directly derived from my observation of the classroom and the audio recording from the classroom observation. These three data collection methods triangulated and complemented each other at an early stage in the research process. Additionally, all interviews finished with a question that opened for any additional input, in order to ensure that no important information about the topic was overlooked.

The interviews were conducted at the participant's workplace in-between class hours, in quiet rooms where we would not be distracted, and they could feel comfortable that they were not being overheard. The interviews were recorded using a recording app on my smartphone and the phone was placed on the table between the participant and me. I made a few notes during the interview, just to be sure that it would be possible to reconstruct the interview in case of a technical failure. This made it possible for me to pay close attention to what the participants were saying, to ask follow-up questions. I could also summarize what they had said, in order to make sure that I had interpreted their answers correctly. By doing so, we avoided any misunderstandings and the participants were given a possibility to reflect upon their own answers and perhaps add some relevant details. After the completion of the interviews they were all transcribed using the tool named ELAN Software[11], a transcription program that contributed to an effective and structured transcription of the data.

[11] Link to Elan website - https://archive.mpi.nl/tla/elan

3.3 Methods of analysis

This chapter has previously described how the data for this project was collected through classroom observation and semi-structured interviews of the three teachers. These methods have provided data as interview transcriptions, field notes, audio recordings from the classroom lectures and personal reflection logs. To create the questions for the interviews, the field notes were analysed, and reflection logs were used as a supplement in the process of formulating interview questions.

Analysing the field notes and reflection logs were important to do ahead of the conduction of the interviews for the purpose of providing tailor-made questions for the interviews. The interviews were then conducted, transcribed, and analysed to answer the research question along with results from field notes and reflection logs. Even though the data were analysed at different times, the method of analysis was the same. Merriam (2009, p. 56) describes the analysing process as necessary in order to categorize and catalogue the collected data to open up the material and make it comprehensible. Postholm (2010, p. 81) illustrates this process with a comparison to the fruit department in a grocery store. Every individual type of fruit is labelled with a name but may be categorized in groups under the label citrus fruit or ecological fruit, as well as the more generalised term fruits.

There are several options to choose from concerning how to analyse your material. Merriam (2009, pp. 165–166) describes the qualitative methods of analysing as a nonlinear process that does not follow a step-by step procedure. The analysis of the material starts as soon as the first data are collected, and the researcher is free to determine how to further proceed with the material in order *to persuade the reader of the authenticity of the findings* (Firestone, 1987, in Merriam, 2009, p. 166). Postholm (2018, pp. 157–164) emphasises several analytical methods that are especially attached to certain types of studies, like ethnographical-, phenomenological- and case studies. However, for this thesis the method of analysis is inspired by the strategies of grounded theory, not as a research paradigm, but merely as an inspiration for the further process of coding and categorizing.

The analytical process in grounded theory is defined as three phases: open coding, axial coding and selective coding (Corbin & Strauss, 2008, p. 195). Despite the three phases, there is no clear distinction between them and the researcher alternates between these throughout the analysis process (Postholm & Jacobsen, 2018, p. 145). Saldaña emphasises that coding requires the researcher to wear "analytical lenses" as *how you perceive and interpret what is happening*

in the data depends on which type of filter covers that lens and from which angle you view the phenomenon (Saldaña, 2016, p. 7). This suggests that as you look at your data several times during the analysing process, new findings will be discovered. However, it is necessary to mention that as soon as I start to analyse and interpret the data it can no longer be seen as objective as it is affected by my subjectivity.

The data of this study is analysed based on an abductive approach. This involves a process where you alternately look for probable descriptions and explanations in the theory, as well as the data (Postholm & Jacobsen, 2018, p. 103). Even though I endeavoured to approach the material with an open mind, the interpretation of the data will regardless be impacted both by what the researcher gleans from the data as well as theoretical perspectives. The researcher's understanding is founded on an interplay between tendencies in the data and the researcher's theoretical perspectives and presumptions (Thagaard, 2013, p. 167). With an open mind, though to some degree influenced by studied theory, I strived to let the data guide me in order to generate new questions, which further lead me to new data and findings, with the intention of letting the research question guide me to saturation. This is the point where the researcher experiences that all the categories in the analysis are well developed in terms of properties, dimensions and variations, which makes further data gathering and analysis unnecessary for the conceptualization. (Corbin & Strauss, 2012, p. 264; Postholm & Jacobsen, 2018, p. 152).

The analysing process requires an exhaustive and systematic review of your data in order to reduce and systematize it. The researcher has to decide what excerpts of the data are important to proceed with and how to arrange them in a lucid structure, which furthermore helps the researcher discover interesting findings in their data. The following sections include a detailed description of how the data have been processed into smaller units and conceptualized in order to analyse the material. The following step-by-step description portrays the analysis process as a linear process. However, this is for the purpose of structure and overview for the reader. The process has in reality been an alternation between the three different phases, in correspondence to Richards and Morse's description of coding as they state that coding is not just labelling, it is linking, as it *leads you from the data to the idea and from the idea to all the data pertaining to that idea* (Richards & Morse, 2013, p. 154).

3.3.1 Open coding

The use of open coding is the process of reducing the data into codes and categories in a satisfactory way, where the aim is to make the data comprehensible and comparable for the

researcher (Corbin & Strauss, 2008b, p. 196). In the process of codifying, the data is divided, grouped, reorganized and linked for the purpose of consolidating meaning and developing explanations (Saldaña, 2016, p. 9). By thoroughly revising the data, the researcher is likely to create dozens of codes. These codes represent concepts that stand for meaning. In order to make the data comprehensible the codes must be sorted into groups, called categories. Categories are codes that closely relate or depend on each other. The strategies used in this process are to ask questions, like "what is this?" and "what is this representing?", and compare different parts of the data to each other to give the same phenomena a common name (Postholm, 2010, p. 88).

Ahead of the actual coding process, I started to read through all interview transcripts and field notes, undisturbed and only intending to get to know my data before I started coding. This is what Saldaña (2016, pp. 20–21) describes as pre-coding, where you may circle around, highlight or underline significant quotes or passages that strike you. These data can further serve as illustrative examples throughout your report. By reading through the data I already envisioned a few essential parts and possible themes, but I further strived to proceed with an open mind when I started on the coding process.

The process of coding involved a large amount of different coloured pens to represent the different codes discovered in the material. To start off, I wrote down notes, comments, observations and queries in the margin according to Merriam's description (2009, p. 178). I used a colour coding system to highlight significant quotes and sentences of interest, for the reason of repetition, surprise, important statements expressed by the interviewees, as well as direct connection to theory or previous studies, in both a correlating and contradicting manner. The coding was conducted on one participant's data at the time, where the interview was coded first and then the field notes, before I continued to the next participant. According to Saldaña (2016, p. 23) the second data set will possibly influence and affect my recoding of the first participant's data, though Saldaña emphasises that reading the interview transcript ahead of the field notes might show an interesting contrast in the data. During the coding process I kept at all times a piece of paper in front me with the research question clearly written on it and with a clear view of my theoretical framework. This for the purpose of staying focused and be reassured of my coding decisions (Saldaña, 2016, p. 22).

After the first round of coding different concepts emerged from the material, like for instance the use of target language, creation of communication and open questions. However, I was left

with a feeling that I needed further depth on the theory of my study and went back to the theory chapter to immerse into the relevant theory before I continued the second series of coding.

The second, third and fourth time of coding led to the emerging of several codes more relevant to my study, new discoveries were found, and more colour pens were needed to cover all codes. After the fourth series of coding some concepts seem to distinctively emerge from the material. These were: availability of DER, classroom environment and communication, the teacher as facilitator, challenges with DER, the teacher's focus on communication and specific DER applied in the SL classroom. The next part of the job was then to reorganize and structure the now colourful set of data into comprehensible categories.

3.3.2 Axial coding

The concept of open coding is to break the data into smaller pieces, whereas axial coding involves strategically reassembling the data that was split during the open coding process and grouping your open codes into categories (Merriam, 2009, p. 180; Saldaña, 2016, p. 244). As part of the axial coding process themes are identified and categories are related to their subcategories for the purpose of creating accurate and complete descriptions of the phenomena (Postholm, 2010, p. 89). Categories can be described as combinations of codes that share characteristics, and the subcategories answer questions about the category (Saldaña, 2016, p. 10). The purpose of axial coding is to decide which codes in the research are the most dominant ones and which ones are less important and eventually can be removed. It can be expedient to ask the questions *when, why* and *under what circumstances,* for the dominant categories to emerge (Postholm, 2010, p. 90; Saldaña, 2016, p. 244).

The colour coding system from the open coding process was helpful for the process of axial coding. However, I quickly realised that the colour that I had chosen for each individual code in the open coding process were completely randomly chosen, as the thought of using different shades of one colour to resemble concepts that I found similar had not occurred to me at that stage of the process. Despite this discovery, I further assessed the codes looking for their belonging and relevance to each other. Through this process, themes, categories, and subcategories were constructed. Multiple codes were brought together to form new categories based on their relevance to each other and the research question. In the same process, some codes were considered and dropped, while others were renamed or replaced. The final result of this process presented the data reduced to three themes including underlying categories and subcategories. The three themes are: teacher's focus on CLT and their concept of DER teacher's

experience with challenges concerning DER as a supportive element of CLT, and communicative classroom tasks using DER.

3.3.3 Selective coding

The last phase of the coding process, selective coding, is the stage of the analysing process where core categories, propositions or hypothesis are developed (Merriam, 2009, p. 200). As the data of this thesis is analysed based on an abductive approach I had a few core categories in mind based on previous studies, but used this phase to examine the data and already created categories to discover if any of the core categories I had in mind correlated with the ones that emerged from the data. By going back to the data, I checked how often each category were connected to the sources and references and by counting the numbers the most contributed categories emerged. At this point I could examine how my anticipated categories matched with the core categories emerging from the analysis process. As a result of the coding process, three themes were identified and pointed out as core. They are presented in chapter four.

3.4 Research quality

Assuring the quality of a study is usually related to the three terms validity, reliability and generalization. Some qualitative researchers have replaced the terms with trustworthiness, accuracy and transferability, as they consider validity, reliability and generalizations to be too connected to quantitative research. However, this study has decided to proceed with the original terms (Thagaard, 2013, pp. 193–194). As a qualitative researcher it is important to state that I am not endeavouring for complete objectivity as I am aware that as a qualitative researcher it is inevitable to avoid influencing the study with my subjectivity. Lichtman claims, “looking for objectivity (in qualitative research) is not only foolish, it is impossible” (2010, p.116). That is because the researcher’s role as the research instrument is naturally influenced by their background and experiences. Depending on the researchers experiences their perspective on the research process will differ. As Lichtman (2010) stated, it is impossible to be totally objective, so the researcher rather needs to be aware of their own subjectivity (Postholm, 2010, pp. 127–128).

Postholm (2010, p. 128) states that the researcher’s subjectivity should not be concealed but presented. In this regard, I will attempt to be transparent and describe my subjectivity, rather than hide it. Accordingly, choices and decisions related to the method and analysis are thoroughly described in order to present the thesis for the reader from my point of view and hence contribute to the quality of the study.

3.4.1 Validity, reliability and reflexivity

Merriam (2009, p. 210) describes validity and reliability as "concerns that can be approached through careful attention to a study's conceptualization and the way in which the data are collected, analysed, and interpreted, and the way in which the findings are presented". In this regard the aspect of research quality is important for people to trust the study. This section describes the terms separately, even though the two combined contributes to the quality of the research.

Creswell (2007, p. 45) presents a short list of characteristics he considers essential in a "good qualitative study" (p. 45). This list includes the aspects of: rigorous data collection procedures, framing the study within the assumptions and characteristics of the qualitative approach to research, utilization of a recognised qualitative inquiry approach, as for instance case study, including a detailed description of methods, data collection and data analysis, and none the least an ethical awareness throughout the research project. This study has attempted, and to a large extent succeeded in following these quality criteria, by the choice of methods and analysis process, and by being as transparent as possible during the entire research process.

In short, validity concerns the accuracy of the research, in terms of how congruent the research findings are with the reality (Merriam, 2009, p. 213). In this thesis the validity is assured through choice of methods and analysis of data. Triangulation was used to secure validity in the data collection. This implies using several types of data collection methods and data sources (Postholm & Jacobsen, 2018, p. 236). The current study secures triangulation through a combination of classroom observation, semi-structured interviews and personal reflection logs by me as the researcher. Additionally, a multiple case study was chosen where three cases (participants) were studied. Postholm (2018, p. 236) emphasises that using various types of data and data sources contribute to ensure an accurate study as it is examined and described from different perspectives and presents a more overall thematic understanding.

Another method to secure validity in the data collection is member checking. It involves providing the participants with access to the data in order to read through it and either confirm or dismiss accuracy (Postholm & Jacobsen, 2018, p. 152). The participants of the current study were all offered to read the completed interview transcripts, but all said no, stating that they trusted my judgement and faithfulness. This illustrates a vote of confidence between the participants and me as the researcher, but slightly decreases the validity of this study. Another threat to the validity was the inadequate opportunity to secure the truthfulness of the

interviewees' answers and their interpretation of the questions. During the interviews, I was able to repeat some questions or reformulate them when I detected misunderstandings, but I probably did not notice them all, which influences the validity of this study.

Reliability refers to the extent to which research findings can be replicated, in other words if the study is repeated will it provide the same results (Merriam, 2009, p. 220). This is however challenging in qualitative research as human behaviour is not static. No classroom will look the same, with different composition of pupils and teachers, and tasks and activities conducted will vary from the one I observed during the classroom observations. Consequently, it will be difficult to replicate this study exactly. Yin (1994, p. 37) states that the general approach to reliability involves to "make as many steps as operational as possible and to conduct research as if someone were looking over your shoulder" (p.37). Linked to my own study, this research project has been described in detail from the stages of planning and preparing to the conduction and analysing process, visualizing the entire process for the reader.

The last strategy to secure the quality of the study is the researcher's position, also called reflexivity (Merriam, 2009, p. 219). This involves a process where the researcher critically reflects on and shares their own perspective, biases and assumptions with the reader. Doing so, they help the reader to understand how the researcher's values and expectations influence the study. I have performed reflexivity through reflecting on myself as the researcher. I am a Norwegian teacher of ESL, particularly interested in practicing and improving pupils' oral communication, as I have experienced the many affordances it brings being a fluent ESL speaker and I find it especially important to make oral practice fun and engaging for the pupils. As a researcher I am unexperienced and new to the field, however interested and eager to learn. I am further aware that all stages of the research are influenced by my subjectivity based on my beliefs and experiences with the research field, additionally to theory and the previous studies I have read.

3.5 Ethical considerations

The theory of ethics deals with the relationship between humans, and the question of right or wrong, and how we in interaction should treat each other. In any human interaction, we influence each other to some degree, both directly and indirectly, and that is crucial for the researcher to be aware of. Observations as well as interviews are typical data collection methods, where the researcher interacts with the participants and ethical issues are to be considered. Ethical considerations require the researcher to consider how the chosen topic can

be enlightened without exposing the participants for unjustified ethical consequences (Johannessen et al., 2016, pp. 89–91). When designing my project, I used the ethical research guidelines derived by The National Committee for ethical research in Humanities and Social Science (Forskningsetiske Retningslinjer for Samfunnsvitenskap, Jus og Humaniora, 2016) as a framework for this thesis. Nerdrum (1998, sited in Johannessen et al., 2016, pp. 91–92) epitomizes the guidelines into three considerations for the researcher to be aware of. These three and their relevance to my thesis is listed below.

The participant's right to self-determination and autonomy. The participants of my study were given a thorough description of the study, both written and spoken ahead of their consent. They also signed an agreement that clearly stated that they could withdraw from the study at any time, without having to justify their reasons (see appendix B). I had an individual meeting with every single person ahead of the classroom observation, where they were given the possibility to ask any questions before proceeding. They got the same opportunity both before and after the interviews, for the purpose of the data collection process to be as transparent as possible.

The researcher's commitment to respect the participant's privacy. The Norwegian centre for Research Data was notified about my research project and I received their letter of approval in order to collect the data needed for this study (see appendix A). Early in the process of data collection, the participants were given both written and oral assurances of their privacy. All data was considered especially confidential and was password protected on my personal external hard drive and safeguarded in my apartment, preventing access for anyone else but me. Additionally, the participants were informed ahead of the interviews that they could choose not to answer any questions of their choice.

The researcher's responsibility to avoid harm. This highlighted guideline is especially important when it comes to medical research (Johannessen et al., 2016, p. 92), nevertheless still important for this study. It was considered if it was necessary to ask any personal questions and how the participants might respond to such questioning. It was important to me that the participants were left with a positive experience after partaking in this study.

3.6 Chapter summary

In this chapter, I have presented the outline of my research project and discussed the chosen qualitative method. By elaborating on the method chosen for both my data collection and analysis, I have strived for transparency. I have presented my reasons for choosing classroom observation in terms of observer-as-participant, and semi-structured interviews as my primary

source of empirical data. The participants of this study have also been introduced in this chapter, for the purpose of providing them with context before proceeding to the analysis in chapter 4.

4. Results and Analysis

In the following chapter, the results of this study are thematically presented. The process of analysis has identified three main themes that will answer the research question: *How do English second language teachers implement digital educational resources in the ESL classroom to facilitate Communicative Language Teaching?* The illustration below (figure 3) illuminates the three themes consisting of: a) Teachers' focus on CLT and their concept of DER, b) Teachers' experience of challenges concerning DER as a supportive element of CLT and c) Communicative classroom tasks using DER.

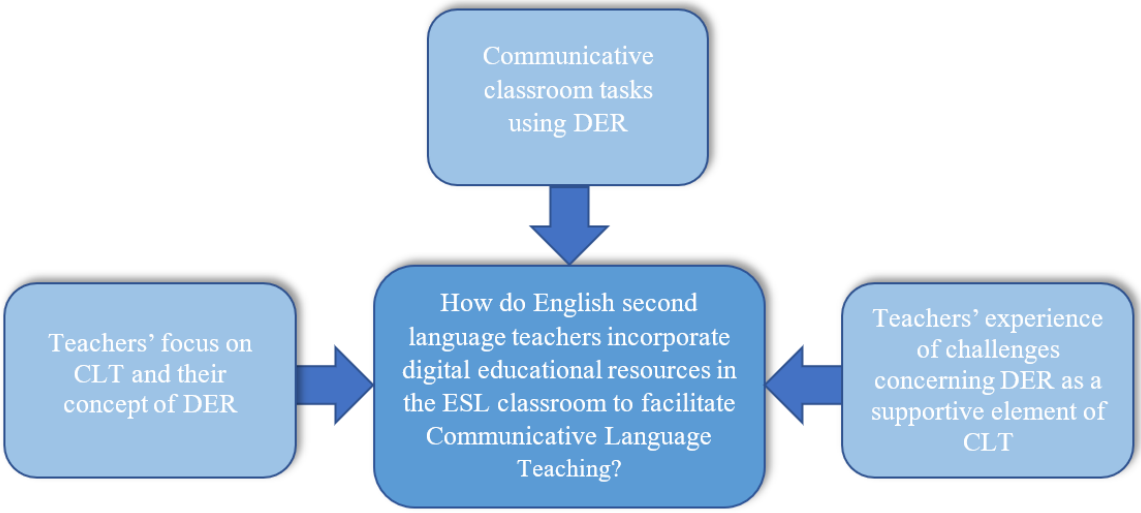


Figure 3. Overview of themes identified to answer the research question

4.1 Teachers' focus on CLT and their concept of DER

This section elaborates the teacher's thoughts concerning their prioritization of CLT and how they work to engage their pupils in conversation. Furthermore, it clarifies their personal view on the use of DER in the ESL classroom as their perception and their experience with these resources has a major influence on how much they choose to apply them in their teaching.

4.1.1 The teacher's priority of Communicative Language Teaching

The CLT approach requires regular practice on communication in the classroom to make the pupils both familiar and comfortable with this approach to teaching. Hilde expressed that she emphasises communication to her pupils to let them demonstrate their knowledge to her and not just stay silent during the lesson.

> *In all my lessons I am concerned with oral activity, and that the pupils show me what they know. A result from many years of experience from lower secondary level is that I*

> *usually tell my pupils that they need to show me what they know. If not, I will not be able to know about their skills and knowledge. My present pupils have improved on this aspect. I get really pleased when they speak English.*

During the observation in her classroom I noticed that she really does focus on letting her pupils show her their knowledge, as she let the pupils speak when they raised their hands. Even if some of the pupils occasionally did not exactly talk about the present topic, she would let them speak. For the reason, I believe, to provide them with the practice of talking in front of their classmates. Hilde was also concerned giving all pupils the possibility to talk, especially the ones that raised their hand.

During the interview she commented on one of the tasks that I had been observing, where they were working with the present progressive form of verbs on the Active board[12]. The pupils were asked to connect the correct pictures to the description that was read aloud on the board. For example, "I am baking", "I am cycling" etc. This turned out to be a particularly popular task, where practically everyone in the class wanted to participate. Hilde emphasised that she wished that she could keep record on who gets the chance to speak to make sure that no one is forgotten. *It was a very good task. They were very energetic about it. In that case it is too bad I did not write down everyone who got the opportunity today, because it is so difficult to include everyone.* So, even though her pupils do not speak in long conversational sentences (yet), they do participate at their present level, and their teacher gives them the opportunity to try and learn to use their oral language in the classroom.

When asking Kari how she prioritizes CLT in her ESL teaching, she highlighted discussions as an approach she uses to get her pupils to talk.

> *Well, I always try to start small discussions or conversations. That is what I focus on the most. The individual needs in each class influences how much I can focus on it, but discussions and sometimes presentations are my major focus. Moreover, we are working on a project where they will be working with skype conversations in order to work with the language in a more authentic approach.*

In her teaching sessions I observed on several occasions that she attempted to start a discussion with her different classes about interesting topics such as the US, segregation, British food

[12] The Active board is a specific version of an interactive whiteboard

culture and Martin Luther King. It did not always turn into a communicative discussion, but more similar to the more traditional IRF[13] pattern. This approach is not necessarily negative as it may provide a useful framework for developing meaningful communication in a controlled form. Through the six lessons I observed, I noticed that part of the inadequate communication was due to the pupils' lack of or reduced knowledge on the topics when the attempted discussions took place. It may make the individual uncomfortable and reluctant to speak out load in the classroom.

Marit answered that she prioritises oral skills as much as the four other basic skills.

> *Every lesson I generally try to include both reading, writing, talking, listening and digital skills, where practice of communication is usually part of a warm-up activity. We usually conduct small discussion tasks in smaller groups or together with the teacher. I try to provide them with a varied lesson, which they respond positively to*.

This excerpt demonstrates that Marit's pupils are provided with regular practice in oral communication, which is beneficial for their development of communicative competence. Her concern with a varied lesson is probably constructive to keep her pupils engaged.

4.1.1.2 Teachers' perception of classroom dialogue

When asking Hilde and Kari how they would define classroom dialogue, their answers were quite short and perhaps not exactly what I expected. Though, I do not believe that this is because they do not know, but maybe I should have asked the question differently. About dialogue, Kari answered in the following manner: *In my opinion it mainly involves dialogue with the pupils in different ways. It is co-operation between the pupils and me. I got their back and they got mine.* A longer answer was provided by Hilde, who defined classroom dialogue in this manner:

> *I think that it is both the dialogue with my pupils from the board and the dialogue among the pupils. So, it is what I am trying to convey them, and then I would also like some sort of response from them to be sure that they have understood anything. Anything of what I have just said. Hence, is why I usually initiate a dialogue with the pupils the following lecture to examine what they learned.*

[13] IRF is a discussion pattern between the teacher and the learner. Initiation from the teacher- the students respond- the teacher gives feedback. Similar and often confused with IRE: Initiation-Respond-Evaluation. This thesis proceed with the concept of IRF (Waring, 2009)

In retrospect, I realize that I should have made a follow up to their answers, especially to Kari's answer, to go in depth of their understanding of the concept. However, there answers are not wrong in any way, but it would have been interesting to know how they assume that the classroom dialogue benefits their teaching and their pupils learning outcome. Hilde's reply responds to what she previously said about encouraging her pupils to show their knowledge through communication and participation in the classroom dialogue.

Unlike the two other teachers, Marit was specifically asked how she proceeds in starting a conversation with her pupils. She emphasised two approaches that she normally uses to get her pupils to start thinking and to connect them to the topic.

> *In the beginning it is usually two approaches to how I proceed to start the conversation. We either start to talk about something that is already familiar to them or we investigate a new topic where we try to figure out what they know about the topic already. So, either like a repetition chat or introduction chat.*

She further highlighted the "think-pair-share" approach as particularly useful with her pupils, and describes the method as a way to give the pupils a certain amount of time to think for themselves without being stressed by other classmates, but also to help boost their self-confidence a little, by talking to their peers and get their thoughts confirmed before they participate in the class discussion.

> *It has several times been proved effective to let the pupils think for themselves a few minutes, let them write some notes and then talk to the person they are sitting next to. A method that is called "think-pair-share". It provides the pupils with a confirmation that they are on the right track, which further may encourage them to speak their opinions out loud.*

As an observer in her class I examined how she applied this method in her Vg1 class when they started to work on a new topic: The USA. The pupils were asked to carry out four minutes of what she called "fast writing". For this task they wrote down everything they related to the topic, everything that popped into their minds. When the four minutes had ended, they shared their thoughts with the peer sitting next to them, and then continued to the classroom conversation. At this stage most pupils probably felt more prepared to speak in front of the class, as each of them had a piece of paper in front of them with notes, that additionally had been discussed and confirmed with another classmate. During the classroom conversation every

pupil participated with a key word or sentence about the topic. The participation was not entirely voluntary, as Marit deliberately asked each and every one to contribute with at least one word that they relate to the US, but they all got to practice speaking out loud in the classroom, which she emphasised that they needed.

> *They all become quiet when they are asked to speak English. I am aware that on several occasions I could have said "oh, interesting key word, do you have something to add to it?" or "what exactly are you thinking of?" And so on. However, because of their insecurity I try to lower the threshold and make them understand that a little is better than nothing.*

As Marit teaches both first year and third year pupils at upper secondary level, she emphasises that she mostly uses the "think-pair-share" approach with her youngest pupils.

> *This is a more common method with my pupils at Vg1[14], where they reflect in pairs first. With my older pupils in Vg3[15] it is more expected that they are able to improvise and participate unprepared in a conversation or discussion.*

Regarding her pupils at Vg3 level, the following excerpt from the data shows that as their age and knowledge level increase, her expectations of them, concerning their participation in oral communication in the classroom, increase simultaneously. At this level they should be able to engage in a conversation in English, without having to prepare in advance. When asked who is usually leading the conversation, Marit answers:

> *It varies a little, but I think that it usually has to start with me. However, I see it as an advantage that my class of vg3 pupils only consists of 19 pupils, instead of 31. There is an increased possibility that they will participate in a class discussion, where I rather function as a moderator. And they have improved when it comes to state their opinions, as they sometimes say, "I do not quite agree with you" or "I rather think that…". So, they have started to challenge each other's opinions.*

This passage shows that her pupils seem to have reached an adequate language level, where they manage to engage and participate in ongoing conversations. Their ability to contradict their teacher or classmates and state their personal opinions requires well developed oral language

[14] The Norwegian term for first grade at upper secondary level
[15] The Norwegian term for third and last grade at upper secondary level

skills, but also self-confidence for the purpose of sharing their personal opinion in front of their class.

4.1.2 The teachers' flexibility to plan their own teaching

The Knowledge promotion of 2006 provides the Norwegian schools and teachers with a general framework of what the pupils are going to learn at different grades. These guidelines to some degree restrain what the teachers can do in their SL classrooms, but also guide them in a direction to obtain a similar education regardless of which school you have attended. Based on these circumstances I found it significant to ask how much individual space and freedom they have to plan teaching, within the national guidelines. Kari answered short and straight to the point *I am free to do whatever I like*. Whereas both Hilde and Marit partly co-operate with their colleagues at the English section. Hilde explained:

> *The English teachers at the same grade, plan the overall framework of the subject together, but I feel that I am free to plan my own teaching, which I am happy about. Because it is important that the teaching methods applied suits me. I have noticed that my colleague and I have different preferences regarding how we teach.*

Just like their pupils, teachers have their personal preferences in terms of how to conduct their teaching. This excerpt shows a balanced approach to how Hilde and her colleagues plan their lesson. They both work together but are also given the freedom and responsibility to plan their teaching individually, which allow them to adapt it to their teaching preferences. Marit manage the planning process in a similar way as Hilde and describes her school's procedure like this:

> *The planning process is very free and up to the teachers to decide. The competence aims at upper secondary level are also quite wide and open that give us more freedom, than teachers at lower secondary level have, I believe. Together in the team we agree on a common plan of the year, I am the subject administrator for English, so I kind of have some power in that respect, I can suggest things that I think we should do, as well as there is an overall thematic framework we need to keep in mind. But in total I do not feel that we are withheld any opportunities because of national guidelines.*

Marit seems comfortable with the planning process at her school and enjoys the opportunity she has to influence the year plan as the subject administrator. It seems that she is able to plan whatever type of teaching she prefers for her lessons as long as follow the year plan the team

has developed. Methodological freedom and a sense of professional pride probably influence teachers' responsibility for the quality of their teaching.

4.1.3 The teachers' role in the CLT classroom

The teacher's role in the CLT classroom is described as especially important as they are responsible to create real-life situations and to facilitate for the classroom communication (see section 2.5.1 for more details) (AbdulRahman, 2015, p. 977). In this regard, it is relevant to examine how the participants of this study act in the classroom and how they consider their own role as the teacher. This section first presents my observations from their classrooms and then examines their reflections from interview transcripts afterward.

Hilde demonstrates in many of her lessons with her sixth graders that she focuses on asking open and wide questions that require her pupils to think and reflect in order to give her a suitable answer. For instance, she asked *what did you see in this movie? Can anyone come up with a reason for*…? etc. These types of questions open up for answers that require more than yes or no and attempt to start a discussion with the pupils. However, for most of her lessons Hilde seemed to have the role of an administrator always supervising the pupils rather than acting as a facilitator like CLT encourages the teachers to be.

Kari performs her role in many ways similarly to Hilde. On some occasions she asks her pupils broad and open questions that open for discussions, like for instance *can someone explain to me what they see in this picture?* Or *What do you think about when I say the USA?* However, questions that require short answers or yes/no answers are in general more represented in her lessons. An explanation for this occurrence might be due to the physical large size of the classroom and equivalent large number of pupils. When the physical conditions are not appropriate for the purpose of CLT it will be challenging to attempt a classroom conversation.

Marit conducts several tasks in her classes mainly functioning as the facilitator for her pupils. They have received responsibility to participate without her supervision. For instance, a task where she depicted pictures of political cartoons one at a time on the Smartboard. The pupils worked in groups of three. They discussed pros and cons about the pictures and potential other thoughts that emerged when they reflected on the cartoons. Subsequently, the groups shared their findings and opinions with the rest of the class, and Marit was the moderator and the pupils did most of the talking. This thesis does not include the study of the pupils' age whether it might

influence the role of the teacher in the ESL classroom. However, one could assume it might become more challenging to follow a CLT approach with younger children.

During the interviews, the teachers were asked how they consider their role in the classroom. From my observations I registered a tendency from all teachers to exhibit a slightly more leading and instructing role in the classroom, than the role as the facilitator to promote communication in the CLT approach encourages. Hence, made it interesting to hear their reflections about this. Hilde said:

> *I wish that I was better at letting the pupils... work more on their own, or work more in groups, but I know that... or my experience is that if I do so, then they just finish their work in two minutes and that is it. The way I do it is maybe easier to me. Or perhaps I feel that they are too young, but maybe they are not.*

In this excerpt, Hilde appears a little uncertain about her role in the classroom. She seems aware of her approach, but also gives the impression that she prefers to stick to what she is used to and continue with the approach that she knows is working with her pupils. She further emphasised:

> *I know that we are not supposed to do it this way, but I want to make sure that the pupils learn what they are supposed to learn, and in that case I think that it is wrong, or not wrong, but there are many other ways to do it, but I feel that they learn what is expected and I get the opportunity to check that they are.*

When I received this answer, it gave me the impression that she thought I was dissatisfied with her work, which I reassured her was not the case. She is, however, aware that the teacher role may be conducted in a variety of ways, but she prefers to proceed with the one she is the most comfortable with. Additionally, her comment about her pupils' young age might be a good reason to continue the way she does.

When Kari received the same question as Hilde about her role as the teacher, she replied:

> *I actually think that is a bit accidental because it varies from class to class. So, I think it depends... what can I say. It depends on the grade as well. Especially I vary my approaches, but in eight and seventh grade I am a bit more in charge because they still need it. Whereas in tenth grade, the pupils to a larger extent, get more independence.*

Their lessons are more discussion based, and often include group work or a station rotation model[16].

Kari does not seem too conscious about her role in the classroom but emphasise that her approach depends on the age of the pupils and their capability to be given more independence. Kari further talked about letting go of the control as she said:

I notice when I teach in tenth grade that I more and more release the lead. That I often walk around the classroom among the pupils. While in seventh and eighth grade I need to keep managing the pupils. If I release the control it becomes chaos. So, they are very different in that regard. It also depends on the group dynamic itself. Some classes handle to be given more responsibility. Others do not.

This excerpt gives the impression that Kari considers the teacher role to consist of only two options. Either an instructed lesson where she is leading, or total chaos. No options in between. It seems that she is most comfortable if she is in "control" as she describes it, but changing the work dynamic in the classroom from individual work to for example group work has no relation to less control and does not imply chaos.

Marit answered similar to Kari that how she teaches varies from lesson to lesson but emphasised that she probably instructed her class a bit more when I was present, so that I would benefit from the time present in her classes.

The way I teach varies from lesson to lesson. However, I guess I was managing the pupils more than normal now that you were here, just to be sure that you would benefit from being observing my classes, and that I would complete what I had planned to do while you were here. I also think it has a lot to do with who I am as a teacher. I prefer to be in lead, to have a plan for the lesson and an overview of what we are going to work with. It also depends on if we are starting on a new topic, and I have to get them started or if we are in the middle of a topic. Then I may let them work more on their own. The group also, some groups manage to work without my supervision, but others need my guidance.

Like the two other teachers Marit prefers to lead and instruct in her class and she has the impression that her pupils benefit from her lessons. She is confident (may feel more certain) of

[16] For lack of a more precise English concept. It is called "stasjonsundervisning" in Norwegian

the lessons progress and of their improvement if she is in control. Like Kari, she also evaluates her role as teacher depending on the group of pupils. Furthermore, it is important to point out that my presence to some degree has influenced her teaching, like she mentioned in the excerpt above. More details about this in section 3.5.

4.1.4 Teachers perception and implementation of DER

This section examines the teachers approach and conscious use of DER in their ESL teaching. The National Curriculum for Knowledge Promotion (LK06) provides a brief synopsis of the Norwegian Directorate for Education and Training's definition of digital skills, as well as a matrix illustrating five levels of skills that pupils can develop during their education. These guidelines are not especially specific. The amount and the quality of the digital implementation in the ESL classroom depend to a large extent on the teacher's digital proficiency and approach towards DER.

The teachers participating in this study turned out to have distinctly different backgrounds concerning their use of DER, which maybe makes this study more interesting. During the interview, the teachers were asked how they viewed their use of DER in their ESL teaching. Kari answered certain:

> *I prefer to teach all my classes as digital as possible. Because that is the way of teaching that I prefer, and I want to prepare my pupils for the technological world that is ahead of them. From my personal schooling DER have always played an important part as I attended schools that participated in research within the field of DER and education, so this is what I am used to.*

Kari seems familiar with DER and has many years of experience from her own schooling, which might have influenced her own perception of DER. She further said

> *The world will become more and more digitalized. It is already digitalized, as well as their exams. Their exams accentuate the pupils' knowledge about source criticism and source reference. The pupils are expected to use sources that are not only from their textbooks. The English subject is especially based on culture, international news and basic(ally) understanding of the world in a bigger picture. You will not get all the updated information using primarily the textbook, but technology can help you to get in contact with the world outside.*

This excerpt demonstrates that Kari views the English subject as an opportunity to provide her pupils with a wider concept of the world they are living in. She wants her teaching to follow the pace of the world's digital development. She also emphasises that in order to deepen into cultural aspects that can help to bring the world to the classroom, source reference and -criticism is highly relevant in order to find and use reliable sources, which is important for their exams as well.

The interview with Kari indicated that she truly enjoys exploring DER and new ways to implement them in her ESL teaching. I was left with the impression that this was more a hobby to her, than a commitment to rigorously follow the national guidelines. The limited amount of time I got to spend as the observer in her classroom did not give me opportunity to observe all her projects, but she explained them to me during the interview, both former and future projects:

> *We use a lot of eTwinning, where we communicate with pupils in other European schools. We discuss topics that everyone is interested in, and this way get a broader understanding of the world. The pupils have realised that they are actually very similar to each other even if they live in different countries. We have also written digital Christmas cards to each other, where we combine language and programming through program using QR codes. The pupils find it more exciting to send cards to an actual person, than just an imaginary one as the textbook ask them to do. It becomes more authentic and they receive a reply. We also have monthly discussions using Padlet. We try to introduce them to a new digital resource every month, which they usually would not have learnt to use. And our future project is to create an app that they are going to use to control a robot located in Greece. My pupils have the instructions and need to communicate in English for the robot to understand the instructions.*

This excerpt indicates that Kari possesses quite a lot of knowledge on what is available within DER, but also a large degree of creativity, drive and energy to conduct all these activities. The extent of authenticity in these tasks is interesting and probably increase the pupils' motivation a great deal. The time limit prevented me from going into details in these projects, but a further follow up would have been interesting.

Hilde proved to be the inexperienced of the three participants concerning their conscious use of DER, but nonetheless very eager to learn and develop her skills. When asking her about her relation to DER, Hilde answered:

I would say that I use the Active board quite a lot. In order to use the interactive whiteboard to write on, to show them pictures, scan things from their textbooks and project it on the board. And sometimes to look up things on the internet

Hilde's description of her conscious use of DER indicates that she has a relatively narrow area of application concerning DER, and it seems that she mostly uses the interactive whiteboard as a developed version of the traditional chalkboard. However, she emphasises a significant ambition to learn more, now that she has been encouraged to explore the field of DER.

And then I have to say, that after your visit here, I have discovered so many... what should I call it, resources. Many other options that I can apply in my English teaching. And the pupils loved it and that is a bit important too. I feel that there has been an increased participation when I started to use the interactive whiteboard more.

This excerpt shows that Hilde might have developed her teaching, during my presence in her class, just as much as I have, and that she has now discovered the value of using DER as a supportive element to her regular ESL teaching. Though I might have expected to observe teachers with a little more experience in this field than she originally had, it was even more rewarding to observe her development and excitement within the use of DER

Marit, who is a relatively new teacher (has taught for six years in total) expresses that she has noticed a difference between her older colleagues and her own way of teaching, and implied that a possible generational change is going on, where the younger teachers are more interested in learning how to apply DER in their teaching than the more experienced teachers are. About her own relation to use of DER she answers:

I find it very exciting because I like to try out new things. It is also big part of the youth's everyday life so it is no point to try and fight against it, but rather figure out how we can incorporate it and make use of the possibilities that it offers. This applies to both computers, cell phones and the interactive whiteboards we have in our classroom. We need to integrate them and use them properly. I also think that we get the most benefit from it if we integrate it as a natural part and not like "now, we are going to work with the computer".

Marit's view and conscious use of DER is perhaps positioned somewhere in between Kari's and Hilde's positions. Where Kari wishes to implement DER as much as possible and Hilde is more inexperienced, Marit finds DER a supportive element, but also emphasises the need for a

sort of balance between using DER and more conventional methods in the ESL classroom. She furthermore emphasised:

> *I believe that DER can provide endless of opportunities to the ESL teaching, but I also think that it is important to value and see the use of more conventional methods. There needs to be a purpose for the implementation of DER*

In this excerpt we see that Kari and Marit have quite different views on the implementation of DER in the ESL classroom, which is interesting. Marit expresses an approach that combines both conventional tasks using paper-based books, pen and paper, whereas Kari's approach seems to involve applying DER in her ESL teaching as much as possible.

Furthermore, Marit implies a contradiction to Hilde's opinion about her pupils' excitement about the use of DER in her ESL teaching. Hilde experienced an increased participation from her pupils, while Marit stated *I think the development at the school have come this far, in which the use of computers is no longer something the pupils consider as something extra pleasant.*

Through observations in both Marit's and Hilde's classes I observed that their pupils responded very differently to the use of DER, just like their teachers stated. Without any proven evidence it is reasonable to assume that the pupils' different responses are due to the age difference between them and the fact that to Marit's pupils DER is their part of their daily routine at school, while to Hilde's pupils, it was quite new.

4.2 Teachers' experience of challenges concerning DER as a supportive element of CLT

This section examines the teachers' experience with how their use of DER to facilitate CLT in the ESL classroom also can lead to challenges. The previous section (4.1.4) demonstrated many of the positive experiences the teachers had towards DER, but the interview transcripts also proved several challenges they face concerning the combination CLT and DER.

The three of them generally agreed on the advantages and possibilities that DER can provide their language teaching. Hilde, who admitted that her experience with DER as part of her ESL teaching is in a learner's phase, was thrilled about the many possibilities that have been revealed using DER. She said during the interview that she saw no challenges regarding DER but emphasised that the time consume increased. *I spend more time to prepare for class, as I prefer to feel well prepared for all lessons. Despite that, I think this has only been positive.*

Kari and Marit, that apply DER in their SL teaching on a regular basis stated a different view. Marit stated that the use of DER *provides an unlimited amount of possibilities in the classroom*. However, she also emphasises that it is a major challenge to maintain her pupils focus and attention throughout the lesson, as they can easily *disappear on Instagram or another web page.* She also said that:

> *If we are working on a non-committing task that they do not have to hand in to me afterwards, many avoid working on it. And if it is an oral task, then there is nothing for the teacher to assess if the teacher is not standing right next to them and listen to their conversation. So, it is definitely challenging to make them stick to the task when they are using DER.*

In comparison to the conventional pen and paper, it seems clear from Marit and Kari's descriptions that some DER provides opportunities that for many pupils appear much more tempting than following the teacher's instructions. DER can be excellent tools and generate for instance group work or writing, much more effectively, but at the same time, they can be time consuming resources with the opposite effect on some pupils. As Marit stated in the excerpt above, it is also challenging to assess the oral tasks conducted, as she is left with no physical documentation.

Kari expressed that she found it challenging to get the pupils to speak while they were working with DER and emphasised that she has to actively work to achieve that. She said:

> *For example, what you saw today [referring to classroom observations]. One of the pupils was siting and pointing at the screen and the other one wrote it down. They never actually discussed what they were doing. That is a challenge. They may risk to never discuss anything as they find it just as easy to just point at the screen and not talk to each other. That is a small pitfall.*

This excerpt shows that even if DER on many occasions can be helpful to facilitate CLT, it also provides the pupils with alternative ways to work. Kari referred to a lesson where the program Learn Lab[17] was used. The pupils were divided in pairs and each of the pupils had their own computer. Kari used the program Learn Lab to simultaneously show pictures relevant to the topic "Segregation" on all the pupils' computer screens. They were instructed to discuss the

[17] LearnLab https://learnlab.net/no/

pictures they were shown and write down some notes to later present to the class. The task that was supposed to be communicative rather resulted in a task where the pupils just pointed at the pictures, speaking as little as possible in the target language or any language at all.

Marit further mentioned that she noticed an increased concentration and quietness when her pupils were asked to write by hand compared to the laptop. Hence, avoiding the distraction that DER may cause. She believes that there should still be certain limits for how much DER should be applied in the ESL teaching and that the teacher needs to consider the purpose for using it. *I believe there is a value to stick to the conventional methods as well, and not just "go crazy" about DER just because the teacher finds it so funny.*

4.2.1 Availability of Digital educational resources

SINTEF's *2019 Monitor Survey* demonstrated that Norwegian teachers have increased their use of DER in their teaching, and that the coverage of personal computers or tablets for the pupils in grade four to grade nine varies between 30- 80%, and the coverage of computers or tablets shared with a classmate varies from 14-64%[18]. When questioning the teachers of the availability of DER at their school their answers differ.

Marit explains that her pupils at upper secondary level all have their own personal computer as well as a cell phone, and that all classrooms are equipped with an interactive whiteboard. The latter was either a Smartboard or a type of interactive whiteboard that you can use as a projector, but where you cannot touch the screen to navigate and write on, like a Smartboard allows you to. She said that she had rarely used the latter one as she found it too cumbersome.

> *I think the Smartboard works much better, so I only use the interactive whiteboard when I am in a classroom with a Smartboard. It is crucial to have satisfactory solutions, because if it requires too much time, then teachers will stop using it as they already have a tight schedule.*

As this excerpt shows it is necessary to have sufficient technical equipment for DER to be applied in the lessons. As teachers manages stressful and busy workdays, satisfactory solutions are the key stone to get the teachers to implement DER in their teaching. As Marit stated above, they will avoid using a tool if it becomes too complicated. However, Marit's pupils at upper

[18] See section 2.7 for specific details

secondary seem well equipped with DER, especially concerning the pupils' personal devices, which provides the teacher with a variety of options to implement DER in the ESL classroom.

Kari teach both at upper primary level and lower secondary level. She enunciates several times during the interview that the availability of DER should be upgraded in order to give the teachers a bigger freedom in choice of teaching methods. She said that:

> *The pupils at upper primary levels share the computers and iPads with the lower primary level, and it is a lack of iPads for the biggest classes. So, we basically follow the principle of first come, first served. The pupils in lower secondary however, have their own personal computer, which they receive in eight grade and keep until they leave tenth grade.*

She emphasises that the process of downloading new and helpful apps or computer software is too complicated to complete on the present resources, as it requires the IT employee to be present in the classroom to facilitate the process of delivering passwords etc, and this is time consuming. *If I were to decide, all pupils would have their own digital unit at this school. Preferably an iPad or something that is easy to use and gives the teacher more freedom.*

When asking Hilde, who teach at upper primary level, she answers:

> *We have some tablets, that we can use to go online, but they are not like iPads. We have asked for iPads, but I do not think we will get any. We also have a computer room and some laptops available too.*

I followed up her answer by asking her if every class has a selection of tablets for themselves. *We have twenty tablets.* Shared by all pupils in sixth grade? *No.* Oh, you mean you share them between all classes at upper primary level? *No, they are shared between both lower- and upper primary level.* This limited number of tablets naturally reduces the possibilities to regularly use them in class, as they are shared by so many classes.

4.2.2 Courses and Professional Development

Regarding the question of guidance and instruction in how to use the DER that has been available at their school, none of the teachers have been offered substantial professional development and describe themselves as mostly self-taught. Marit says that her school has employed two pedagogues of ICT that offer help and specific courses from time to time, but

emphasises that despite the help available, the tight time schedule that teachers face during their workday prevents many teachers from attending, even though they would like to learn more.

Hilde said they were given considerable instruction in how to use the Active board when they first received it, but they have not received any specific training in how to specific programs or software directly related to the English subject or other subjects. *It is a bit unfortunate that it depends so much on the teacher. There are probably a lot more opportunities, we just do not know about them.*

Kari gives the impression of being the one with the most interest within the field of DER, but she has not received much training or been offered any courses. *I am mostly self-taught. We did get instruction on how to use Its Learning, but I was already familiar with that platform, so except for that one course, nothing really.*

4.2.3 Adapted education and the feeling of safety

The theory chapter of this thesis attempted to demonstrate the focus on communication in the CLT approach. An answer that was repeated by all teachers during their interviews was the challenge of actually getting their pupils to communicate in the classroom with the teacher and classmates attending. Even though they intend to create a communicative classroom where the pupils actively participate, there are several obstacles that prevent their intention of a communicative language classroom from being easily fulfilled. In this chapter I also elaborate how they try to adapt their teaching in order to include all their pupils, no matter what prerequisites or level they are at.

Kari pointed out herself early in the interview that she has been working a great deal to practice oral skills with her pupils to make them comfortable to speak in the classroom in front of their classmates.

> *It is important to me that the pupils know "where they got me, and that I know where I got them". Personally, it is important to create an atmosphere in the classroom where the pupils can feel secure, and not be afraid to speak. So that has been my focus. That they feel that it is a safe environment for them.*

She emphasises that this is a work in progress for her pupils during the three years they attend lower secondary level. During my observation sessions in both her eighth grade and tenth grade I noticed that there was a difference between the classes in terms of the extent of

communication. This may be a result of her long-term effort to increase her pupils' comfort to eventually increase their oral participation in the classroom.

The process starts in eight grade and as time passes and they continue to practice, her expectations and requirements increase.

> *I do feel that there is no one who are afraid to speak. There are some pupils that do not want to speak, but they have a reason for it. When they have oral presentations, they never do it alone. They are taught that they can choose between the 57 pupils as their audience, and during the three years at lower secondary the number of audiences increase, and in the end, they present their presentation for the entire class.*

This excerpt also shows that she makes sure to facilitate for the pupils that need extra time and/or training in order to attempt to speak in the classroom. The pupils seem to be treated accordingly to their prerequisites and given the time needed.

Hilde, who has many years of experience as a teacher at lower secondary level, states that based on her background she knows how important it is to practice communication at an early age to prepare them for lower secondary level. Though she emphasises that, even if she specifically concentrates on the communicative aspect of language teaching, she has to adjust her focus to include all her pupils. She further said:

> *I highly value oral activity in the classroom, but some of the pupils in my class are afraid to speak in front of their classmates, so I cannot only focus on the oral aspect of the language teaching, but it is very important. It is even an individual grade in lower secondary level, so they have to develop their oral skills.*

Just as with Kari, there are also pupils in Hilde's class that are uncomfortable speaking in front of their classmates, which makes it necessary for her to vary her teaching in order to include all her pupils. Even though she knows from her experience at lower secondary level that oral communication has a high value and an individual grade at the higher levels, she still needs to care for her pupils' challenges. However, Hilde also describes a different challenge related to her pupils' communicative competence. *Another issue concerns the restless boys who are especially clever. For instance, one boy in my class is very good at English, but he just does not bother to participate.* This excerpt illustrates that there are possibly more reasons than primarily anxiety that prevent the pupils from participating. Their motivation might also impact their oral participation.

Marit emphasises the importance of facilitating for a slow development of oral activity in the classroom and not pushing pupils too hard in order to create a slow progression towards a more communicative ESL classroom.

> *When we start with a new topic or are about to finish a topic that we have been working on for some time, I ask them to first note down what they know on a piece of paper. Then they discuss their notes or keywords with the fellow pupil sitting next to them before we talk about their thoughts in plenary. This way, everyone should have something to contribute with in the class discussion, and if they do not, they can always borrow a few keywords from the pupil next to him/her.*

This approach seems like an approach that would suit many pupils. It gives the pupils time to think about their answers first and they can get support from their classmates before they participate in the classroom discussion.

4.2.4 Communication using the target language

An aspect all three teachers highlight is their pupils' willingness to communicate in English rather than Norwegian. Whether the pupils are eleven or eighteen, communicating in the target language is where all teachers find room for improvement. Hilde said:

> *I think it is fun if they answer in English, but some struggles to do so, and in that case, I believe it is fine if they answer in Norwegian, because that shows me that they have understood the subject of the lesson.*

Considering her pupils are about eleven years old, it is reasonable that several of the pupils still struggle to communicate in English, but it is positive that some of them make an effort to answer in English. Furthermore, when the teacher communicates in English and the pupils answer in Norwegian, as Hilde stated, it demonstrates that they, after all, have understood her. She adds however that: *a challenging part of talking with the pupils in English, is to avoid that any of the pupils fall through.*

In order to facilitate for the pupils with difficulties with oral communication inside the classroom, she describes a procedure that she uses to make sure that all her pupils practice their oral skills, but at their own level.

> *After we have completed a topic, like for instance the USA and the American flag, I usually bring individual pupils to a spare classroom where I ask them specific questions*

about the topic they have just learned. For example, what are the colours of the American flag etc in order to push them a little extra to speak English only with me, rather than the whole class.

This excerpt demonstrates Hilde's approach to accommodate the pupils that struggle with oral communication in the classroom. Instead of talking to the whole class, they get an opportunity to speak only to her and get the language practice. Hopefully, slow progress will bring the pupil back into the classroom and talk in front of classmates.

Kari expressed that *many of my pupils still prefer to talk in Norwegian. They have no problem with doing online searchers in English, but the communication is preferably still in Norwegian.* This further makes the aspect of oral communication in the ESL classroom challenging, as the teacher rely on its pupils' participation to develop a classroom conversation. This is also identifiable with upper secondary level, where the pupils' sense of safety and security are just as important for the older pupils in order to speak in class. Marit says that in one of her classes the pupils are very quiet and that she needs to proceed slowly when it comes to push them to speak. *They are a rather quiet class. Not by nature but become quiet when they are asked to speak in English. On a good day I might see three hands in the air.*

4.3 Communicative classroom tasks using DER

The research question of this thesis asks *How do English second language teachers incorporate digital educational resources in the ESL classroom to facilitate communicative language teaching.* The previous sections have elaborated on different aspects that the teachers emphasised as positive and/or challenging regarding the implementation of DER to facilitate CLT. Hence, this section responds on the *how* aspect of the research question by illustrating some of the specific tasks and activities that were conducted during my presence as the observer. The teachers' reflections about their choice of activities are also presented.

4.3.1 Interactive maps as a conversation starter

During the first lesson I observed in Hilde's ESL classroom her class was just starting to work on a new topic: The USA. They started by watching a short movie about the country and then discussed what they had noticed in the film afterwards with the pupils raising their hands to answer. Furthermore, the detailed and well-illustrated map of the United States illustrated below (figure 4) was presented on the Active board, illustrating the fifty states and drawings of specific characteristics from different parts of the country.

Figure 4. Map of the USA map. By Lokus. From https://www.lokus.no/open/questelevnettsted6/OK-USA/Map-of-the-USA

Hilde used the map to assist her pupils as she first gave her pupils an opportunity to tell what they already knew about the country or if there was anything from the movie they had just seen that they could relate to the map. The map was an interactive map, and they continued to a task where the pupils were asked to place different landmarks and attractions on the right location, for example Disney World. This was conducted by one pupil at a time walking up close to the interactive whiteboard, choosing one of the attractions and dragging it to the correct spot. The map stated a few facts about the attraction when it was placed correctly.

This task turned out to be immensely popular among the pupils. Every pupil wanted to try, but there were unfortunately not enough attractions for everyone to get the chance. In my field notes I wrote:

> *Basically, a quite easy task, but fun for the pupils to get the chance to use the Active board themselves. Not that much communication, but it is absolutely possible to make it more communicative. Perhaps also a valuable task for the pupils that struggle to sit still for the complete lesson.*

During the interview I asked Hilde to reflect on this task and share thoughts about possible changes that could have been done to improve the oral aspect. Hilde answered that she noticed a tremendous difference in her pupils' engagement and participation and was so pleased with the task that she recommended it for her colleague. Regarding changes for increased communication she said:

> *Definitely I could have done improvements. They could probably have been asked to say something about the attractions they located, and I think I could have used the task to*

include the pupils that struggle to speak English a little more, by trying to ask them simple questions about colours they saw on the map or something like that.

This excerpt demonstrates that Hilde seems to have discovered a new approach to increase her pupils' interests and another way to use the interactive whiteboard in her teaching. She also shows a positive attitude towards possible improvements of this task in order to increase the pupils' communication practice, but also as a task where she can include the lower achieving pupils more. Her positive attitude is clearly illustrated in this excerpt:

After being a teacher for a while, it is perhaps easier to just…[19] *It is good that you ask these questions because it makes me think. It is perhaps easy to think that it went well, and then forget that you can do it even better the next time with some changes.*

4.3.2 Learn Lab – communication in densely populated classrooms

In one of Kari's lessons in tenth grade they used a program called Learn Lab (mentioned in section 4.2). In my field notes I described the program like this: *A practical resource that allows the teacher to manage the pupils' computer screens, so everyone is watching and keeping their focus on the same thing. It makes it easier to teach bigger classes.* They are working on the topic "segregation" and pictures related to the topic are displayed on everyone's screens. They are asked to reflect on the pictures they are shown in pairs before they shared their thoughts in plenary. I wrote this in my field notes: *the pictures give the pupils the possibility to reflect and think for themselves as the pictures do not provide any right or wrong answers. They may be connected to both history, politics, sociology etc.*

The plenary discussion further carried on with little participation from the pupils, even though they had prepared for it through discussions with a partner. The teacher asked a question and received a few answers, but it never evolved to a fluent conversation. In my field notes I wrote:

It seems like the teacher does not use the right strategies to keep the communication proceeding. Her questions are often close to yes/no questions that does not promote communication. She sometimes uses difficult terms which I think would help the pupils if she spent some time explaining them or explore them along with the pupils to understand the concept of the terms. I believe that part of the reason for the silence is

[19] "..." indicates a short thought process by the participant

because many of the pupils' struggle to understand the topic they are talking about. I like the idea of Learn Lab, but it could have been exploited even better.

During the interview, I asked Kari what experience she obtains from the use of Learn Lab and how she could make this task even more communicative. She answered:

I am in general very pleased with the program. I primarily use it in tenth grade because they are so many pupils and this program provide everyone with a good view of the interactive whiteboard, but on their personal screens. Usually, I add some questions as well and not just pictures to discuss. This works well with this class because they prefer the teaching to be more theoretical, but I did miss the discussion from a group of pupils that are usually participating in oral discussions. They were very, very quiet, but normally talks a lot.

This excerpt indicates that Learn Lab works as a practical DER in her class with a large number of pupils. Perhaps not the resource that promotes communication the best, but rather a resource that helps the teacher to gather everyone's attention towards the same topic. The lack of communication might be affected by the large number of pupils in the classroom, which make them anxious to speak in front of so many people. Moreover, as Kari stated, she perceives them in general to be more communicatively engaged than under my observation. Perhaps my presence in the classroom has affected their participation in the ESL classroom?

4.3.3 Spontaneous communication by using "Shock Talk"

Marit conducted a warm-up activity with her pupils in Vg3 that she called "Shock talk". It was basically not very connected to DER, but it was however very communicative. The pupils worked in groups of two-three people and were given a topic to talk about for 30 seconds. As they were working on UK politics, they were asked to discuss terms selected from an episode of Last Week Tonight Show with John Oliver concerning Brexit, which they had previously watched on YouTube. Terms such as "snap election", "Lord Buckethead" and "negotiations". Marit placed a large stopwatch on the interactive whiteboard and as an extra competition the pupils took turns being in charge of the stopwatch and competed in stopping the watch as close to 30 seconds as possible. The stopwatch served as the digital alibi, but it really did engage the pupils. They had to keep talking until the time was out, and if they did not have anything more to say about the topic, they had to continue talking about something else, but still in English. In my fields notes I described the task like this:

> *Very nice and effective activity to get the pupils talking, as well as it is very adaptive to all types of topics. It can be applied as a repetition practice, but also as an activity to examine what the pupils know about a topic they are about to start working on. Seemingly, all pupils participated, and this activity makes it easier to include everyone as they do not have to speak for more than one or two classmates. Less frightening.*

Marit also emphasises the task as great for repetition or before they start a new topic. She said she usually prepared the concepts herself, but if she did not make it in time, she would ask the pupils to help. *"What do you remember, do you have e key word from yesterday? Yes, that is a good one. Thirty seconds about that one, ready, set, go!".* She further said that she explains the pupils

> *If you are able to talk about this for thirty seconds, that is great. However, if you do not, you just have continue talking about anything like "I am not sure, but I think I have heard about it, maybe it fits in, I do not know much about this topic, but I have to speak English for half a minute because this is a English lesson, so then I have to speak English…"*

Marit further emphasise that the fact that they have to continue to talk for the 30 seconds, help them to practice their fluency and getting used to speak English without preparations.

> *They have to keep it going in English. So, it is all about fluency and spontaneous interaction, where you have to talk about something you have not prepared, just like in an interpersonal conversation. And on top of all this, the professional focus is still ensured.*

This activity seems to really provide the pupils with an educational outcome, especially regarding the communicative practice. And Marit as the facilitator gets the opportunity to walk around and listen to all the communication going on to assess and follow-up on their progress.

4.4 Chapter Summary

This chapter has thematically presented the findings in the study with basis in the three themes discovered in the analysis process: teachers' focus on CLT and their concept of DER, teachers experience with challenges concerning DER as a supportive element of CLT and communicative classroom tasks using DER. In summary, the teachers were all concerned with oral communications, but it differed in how they worked to engage their pupils in communication. They all felt positively towards the incorporation of DER in the ESL

classroom, but the findings revealed that their experience with DER and thoughts upon how much it should be applied diverged. Challenges regarding CLT and/or DER also emerged, such as fear of speaking the target language in front classmates, DER as a distraction, and access to DER. Finally, a few examples of communicative tasks using DER were presented. The following chapter discusses the findings seen in the light of previous research and relevant theory.

5. Discussion

The purpose of this study was to explore how English second language teachers implement DER in the ESL classroom to facilitate communicative language teaching. Through providing a comprehensive understanding of the matter, the aim of this study is to provide important knowledge on how DER can be incorporated as a supportive element to improve the development of a communicative language classroom.

The findings in this study present that the three teachers all prioritize the practice of CLT as they view oral communication as an especially important part of ESL practice. They also emphasise the many opportunities that DER can provide the ESL classroom. Challenges related to the CLT approach were expressed as the pupils' fear of speaking the target language in front of their classmates. Regarding DER, there were concerns about the distraction it occasionally caused the pupils and the worry about DER sometimes having the opposite effect on CLT. Instead of being a tool that could help the pupils communicate, reverse opportunities emerged where they could solve tasks by pointing on the screen instead of finding answers through communication with each other.

This chapter reflects upon the findings of this study in relation to presented theory and -previous research for the purpose of answering the research question: *How do English second language teachers incorporate digital educational resources in the ESL classroom to facilitate Communicative Language Teaching?* In order to do so, this chapter is structured based on the three main themes that emerged in the analysis process. First, teachers' focus on CLT and their concept of DER will be discussed related to relevant theory. Secondly, teachers' experience with challenges concerning DER as a supportive element of CLT. Finally, the presented examples of communicative tasks using DER from the teachers' lessons are discussed. This will lead the way to the final chapter (conclusion) of this study, where I revisit the research question and conclude the entire study.

5.1 Teachers' focus on CLT and their concept of DER

This section discusses how the teachers prioritize CLT and how they engage their pupils' in communication. It further elaborates on their concept of DER, which influences how and if they choose to incorporate DER in their ESL teaching.

5.1.1 Teachers' priority of Communicative language teaching

The findings of this study show that the three teachers all emphasise oral communication, either in terms of discussions, repetitional conversations or as a chance for the pupils to demonstrate their knowledge and skills to the teacher. For example, Hilde stated: *In all my lessons I am concerned with oral activity, and that the pupils have to show me what they know*. In line with Krashen's (1982, p. 10) theory of Second language acquisition, the teachers strive to make the pupils use the second language as a natural part of the lesson, which can improve the pupils' subconscious process of language learning. The teachers' concern with oral communication further correlates with Doqaruni (2014, pp. 1–2) who considers communication in the second language as the very core quality of ESL learning. However, even if the teachers share the same ambition of promoting communication, they proceed differently. The CLT approach is described as a broad approach to teaching (Banciu & Jireghie, 2012, p. 94), which indicates that there are many options for the teachers to choose from concerning how they integrate CLT.

In line with theory about CLT, the three teachers aim for their pupils to speak the second language in the classroom and acquire native-like pronunciation, but avoid the focus on grammatical structures (Banciu & Jireghie, 2012, p. 94; Bjørke et al., 2014, p. 20). The findings from both field notes and interview showed that Hilde was especially concerned with letting her pupils speak and demonstrate their knowledge to her. In correspondence with Savignon (2007, p. 209) she encouraged her pupils to ask for information as she tried to engage their curiosity about the topic.

The field notes showed that Hilde did not correct any of their pronunciation or word choice and rather focused on the opportunity for communication practice, by asking questions such as *what did you see in this movie?* Or *can anyone state a reason for…?* (Lightbown & Spada, 2013, pp. 68, 159). As she let the pupils speak, even though they were talking about something unrelated to the topic of the lesson, she provided them with practice in communication. This correlates with Dörnyei's (2003, pp. 12–13) concept *willingness to communicate* as he implies that there are always proficient learners that avoid speaking, while other L2 learners enjoy speaking even if their knowledge and/or language is defective or incorrect. However, Hilde gives all her pupils a chance to talk, regardless of their language level or the relevance of their statements. This provided opportunities for everyone to improve their communicative competence.

Another aspect of Hilde's focus on communication is that she uses the response she receives from her pupils as an indication of her pupils' progress and what they have understood from

her teaching: *I would like some sort of response to be sure that they have understood anything.* According to AbdulRahman's study (2015, pp. 981–982) one of the main challenges among teachers using CLT was the difficulty with assessment, as it provides no physical documentation of the pupils' progress. Hilde seems to view the communication with her pupils as an opportunity to evaluate the answers she receives to follow up her pupils' understanding. This is, however, not sufficient in order to grade the pupils' oral skills, but as Hilde's pupils are still in lower secondary where grades are not implemented, her assessment strategy provides her with an indication on her pupils' level.

Kari emphasised discussions and presentations as her priority and main approach to engaging her pupils to talk, though she quickly mentioned that individual needs among her pupils made communication challenging to focus on. Svenkerud et al.'s study (2012, pp. 35-49) demonstrated that presentation practice accounts for 84% of the time spent on oral practice, whereas discussions and debates that are more in line with the aspects of CLT only accounts for 9,6%. Authentic situations were however important to her. Unfortunately, I did not observe any of the specific authentic tasks, but she mentioned during the interview that they were working with Skype conversations and sending digital postcards to international school classes, where she emphasised how engaging it was for the pupils to receive answers from their actual pen-friend. The notion of authenticity is noted as especially important in CLT, which these activities provided (AbdulRahman, 2015, p. 976).

Moreover, the use of Skype and letter writing may improve the pupils' sociolinguistic competence, which Canale describes as the use of appropriate language in a communicative situation (Canale, 1983, p. 1; Mustafa, 2015, pp. 17–18). It should however be mentioned that the details around the conduction of lessons using Skype and digital postcards were not described in the interview. Immediately I embrace this authentic task, but at second thought I see obstacles. How time consuming and challenging it must be to organise, especially the Skype conversations, potentially in co-operation with international ESL classes, regarding time differences, class schedules and the pupils' language knowledge and ability to have a conversation of a certain quality.

Marit referred to the five basic skills constituted in the LK06 regarding her prioritization CLT. Oral skills serve as one of these skills, hence it is one of Marit's focal points in every lesson. Oral skills are described as skills where you create meaning through listening and speaking (Norwegian Directorate for Education and Training, 2012, p. 6), and in the interview Marit

stated that she in general practiced communication through warm-up activities like different types of discussion, equivalent to Kari. The term discussion is a quite general term and I should have asked in the interview for specific approaches to how they conduct these discussions. Rahman et al.'s study (2018, pp. 295–310) demonstrated that teachers' belief of CLT does not always translate into their teaching. Hence, it would have been relevant to observe more of how the mentioned discussions were conducted.

My field notes however, highlighted that the discussions can be linked to any kind of topic, which makes it possible to link the classroom language learning to authentic situations, which may further increase the pupils' motivation as they aspire to communicate about meaningful topics (Banciu & Jireghie, 2012, p. 95). For instance, the field notes described Marit's topic on British politics and Kari's lesson about US segregation as topics which both have the potential to be perceived as meaningful topics by the pupils.

5.1.2 Teachers' approach to engage their pupils in oral communication

AbdulRahman (2015, p. 977) describes the role of the teacher as utmost important in CLT, as the teacher has the responsibility to create real-life situations that generate communication. In this regard, the findings show that Marit uses the activity *Think-pair-share* as an approach to start communication, where the pupils get time to prepare before they are expected to participate in a plenary conversation. Marit emphasised in the interview that *it has several times been proved effective to let the pupils think for themselves a few minutes, let them write some notes and then talk to the person they are sitting next to.* Despite the major focus on communication within CLT, this writing practice as a preparation for communication is supported by Banciu and Jireghie (2012, p. 98). They indicate that CLT is not only communicative, but also value reading and writing skills, as these competencies are necessary to make the pupils' second language more fluent.

Marit further accentuated that she usually starts the conversations but emphasised that her class of Vg3 pupils has developed their communicative competences in terms of their ability to contradict and state their opinions. Marit said *they have improved when it comes to state their opinions, as they sometimes say, "I do not agree with you" or "I rather think that…". They have started to challenge each other's opinions. I rather function as a moderator.* This aligns with Savignon (2007, pp. 213–214) who describes the role of the teacher in a CLT classroom to be talking less and listening more to the pupils' conversations. A fluent conversation where the pupils practice the use of language can be connected to Richards (2006, p. 16) definition of

a communicative practice, the most advanced of his three stages of practices. However, considering the age of Marit's pupils it is reasonable to anticipate that the pupils manage to state their opinions and participate in a plenary discussion, which Marit also indicates in the interview. She said that her oldest pupils *were expected to be able to improvise and participate unprepared in a plenary discussion.*

The findings in the field notes demonstrate that both Hilde and Kari are concerned with asking open and wide questions to engage their pupils in conversation, such as *can someone come up with a reason for...* or *what do you think about when I say the USA.* Questions, which require the pupils to think and reflect in order to be able to give an appropriate answer, and not just yes or no. In order to facilitate the communication, it is crucial that the teacher generate communication through real-life situations and engage the pupils to speak. The CLT approach depends on the teacher as a facilitator for the communication to develop, and preferably the conversation should continue without the teacher managing it, but rather observing it and play the role as the moderator (AbdulRahman, 2015, p. 977; Savignon, 2007, p. 213).

The findings, however, show that the three teachers all had difficulties in finding and accepting the facilitator role. They were accustomed to holding the leading role of the classroom, as they preferred to instruct the class in order to make sure of the pupils' progress and their learning outcome. This correlates with both Rahman et al.'s (2018, pp. 295-310) and Svenkerud et al.'s studies (2012, pp. 35-49) which indicate that oral practice is often given a lower priority by the teachers for the benefit of teaching explicit exam preparations. As the findings show, Marit emphasises that her personal preferences influence how she teaches, and the other teachers agree and share her view. A teaching approach that feels comfortable for the teacher is important for the quality of the lesson. As the findings show, Hilde prefers to plan her own lessons as she then can apply the teaching methods that suit her, rather than using the same methods as her colleague, who has different preferences. Kari and Marit agree with Hilde and emphasise the importance of methodological freedom. So, in order to make CLT a more satisfying approach for the teachers, it might be constructive to undertake professional development to refresh their experience and increase their knowledge and self-confidence with this communicative approach. This is a general request from teachers, as AbdulRahman's (2015, pp. 978–979) study proves this to be one of their four main problems concerning CLT.

5.1.3 Teachers' concept of DER

As digital skills are implemented as one of the five basic skills in the Norwegian curriculum, teachers are now in the forefront of helping their pupils to develop digital skills. Developing pupils' digital skills or literacy, however, requires that the teachers also have developed digital literacy or professional digital competence in their subjects (Norwegian Directorate for Education and Training, 2012, p. 6; Payton & Hague, 2010, pp. 11–12). The teachers in this study proved to have quite different backgrounds regarding their digital literacy and implementation of DER.

The interview showed that Kari had definite opinions about the importance of DER: *I prefer to teach all my classes as digital as possible*. She emphasised how her teaching needs to follow the world's digital development as she stated *I want to prepare my pupils for the technological world that is ahead of them*. She further expressed how DER can provide the pupils with a wider concept of the world. This correlates with CLTs notion of providing the pupils with real-life simulations and authentic input (AbdulRahman, 2015, p. 976), which demonstrates how DER can assist in the facilitation of CLT in the ESL classroom. Røkenes & Krumsvik (2016, p. 4) support this notion as they advocate for access and exposure to authentic language material and communication opportunities through DER.

The findings indicate Hilde as the least experienced of the three teachers regarding DER. She basically used the Active board as a developed version of the chalkboard and implemented tasks provided by the textbook's ancillary educational websites. Her narrow practice with DER correlates with Mishra & Koehler's (2006, p. 1018) argument where they demonstrate that it is not sufficient to simply introduce DER to the educational process if the teachers are not trained in how to use it. Teachers need to possess digital literacy to a certain level that enables them to implement DER as partner, where the pupils learn *with* DER in meaningful tasks (Howland et al., 2014, pp. 5–7). Hennessy and London (2013, pp. 5–24) conform with Howland et al. as their study showed that DER itself has no transformative power. Moreover, meaningful use of DER depends on the teachers' professional knowledge as a mediating role between the pupils and the DER.

Hilde expressed in the interview an increased motivation and desire to learn more and develop her knowledge about DER. Teachers in general have very busy schedules and it is probably easy to just follow old and familiar tracks. The well-known and proven approaches are likely more time effective than delving into something new. Nevertheless, exposure and

demonstrations of meaningful tasks with DER are important to present to teachers, so that they can develop their digital literacy from specific input. This may further contribute to reaching Howland et al.'s (2014, p. 7) ultimate goal, where DER are used as engagers and facilitators for thinking, supporting productive thinking and meaning making by the pupils.

Marit describes herself as more of an explorer regarding creative use of DER compared to her older colleagues. She indicates that DER needs to be incorporated in the ESL classroom in order to reflect the pupils' everyday life, which is very much influenced by digital devices. Similar to Hennessy and London's study (2013, pp. 5–24), Marit emphasises that her teaching does not entirely improve as a result of the incorporation of DER. She states that there needs to be a purpose for the DER. *We cannot just go crazy about it, just because the teacher thinks that it is fun.* Her allegation unifies with Hansen's (2010, pp. 19–21) three conditions of functional resources, where he expresses the need to consider the technology, the activity and the purpose. Moreover, the DER itself is not the important part, but rather the activity that it is a part of. The OECD report from 2015 agree on this notion as they specify *that technology can amplify great teaching, but great technology cannot replace poor teaching* (OECD, 2015, p. 4).

5.2 Teachers' experience of challenges concerning DER as a supportive element of CLT

The research question of this study asks *how* DER is implemented in the ESL classroom for the facilitation of CLT. However, the answer to this question is not straight forward. The findings of this study illustrate that there are many aspects for the teachers to consider in order to achieve a communicative language classroom, as for instance the pupils' fear of speaking out loud in front of their classmates, but also the distraction that the DER caused to some pupils were mentioned as problematic in the interviews. Hence, this section discusses the teachers' experiences with challenges that have occurred to them.

5.2.1 The extra time effort

Hilde showed the most positive attitudes towards the use of DER. She considered the extra time consumed for preparations to be the only challenge. The extra time effort she spent in order to feel comfortable with the different approach to teaching. However, it is reasonable to think that her lack of experience with DER might be the reason why she has still not discovered more potential challenges, in resemblance to the other two teachers. Moreover, the extra time effort Hilde mentions, is according to Mishra and Koehler (2006, p. 1023) one of the main issues for

teachers who are reluctant to use DER. In combination with the concern around change, this might explain why Hilde has chosen to stay with her regular teaching approach until this study was conducted.

5.2.2 DER as a distraction

Marit as an upper secondary teacher used DER in her ESL teaching on a regular basis. As she stated in the interview, it was just as regular to apply DER in her lessons as it was to use conventional educational resources. She emphasised that in all her lessons she strived to include all the five basic skills, including digital skills. However, she underlined that she experienced a major challenge to keep her pupils focused and not get distracted by the DER. This correlates with Gilje (2017, p. 105) who stated that DER can have a negative effect on the pupils as it distracts them from the teaching or the present task. Furthermore, his review on cell phones' negative influence on the pupils' learning might show resemblance to the impact of other DER. A laptop or a tablet provides just as many distractions as a cell phone does, so it is reasonable to assume they would have the same negative influence on the pupils' concentration. However, it is unrealistic to expect a decrease of digital distractions in society in the future, and as a result, pupils have to adapt to the challenges and learn how to make priorities and stay focused even if surrounded by digital temptations and distractions.

5.2.3 CLT, DER and assessment

In both lower and upper secondary school assessment forms an important part of the teachers' everyday work for the purpose of being able to grade their pupils. In addition to the challenge of DER as a distraction, Marit also emphasised that communicative tasks using DER are especially complicated. Those types of tasks leave her with no verification of what the pupils have actually done, and with no indication on their progress and current level, unless, as she stated in the interview, she *stand[s] right next to them, and listen[s] to their conversations*. That is difficult to perform with 20-30 pupils in her class. The challenge of assessment correlates with AbdulRahman's study (2015, pp. 978–979), where the ESL teachers expressed a need for a specific instrument to assist in the assessment of conversations among the pupils. The CLT approach encourages communicative tasks, but the teachers in Abdulrahman's study found it more feasible to assess pupils' individual presentations. The notion of assessment is possibly one of the reasons why less time is spent on oral practice in Norwegian schools. As Svenkerud et al.'s study (2012, pp. 35–49) demonstrated, only 20% of the total amount of Norwegian

lessons were practiced on oral skills. A similar percentage possibly accounts for the ESL lessons as well. That is unfortunate as the pupils' second language requires even more oral practice in order to develop a proficient oral language, than their first language. Svenkerud et al. argue that the structure of and emphasis on exams contribute to how much attention oral communication receives. Hence, there appears to be a contradiction between the LK06 requirements for oral skills and the current form of examination.

5.2.4 Availability of DER and professional development

As outlined in the findings, the availability of DER differed among the teachers. Marit's pupils at upper secondary level were equipped with their own personal computer and the classrooms equipped with interactive whiteboards, whereas Hilde's pupils in upper primary level shared twenty tablets and a computer room with the entire primary level. Additionally, they had interactive whiteboards in the classrooms. The numbers presented in SINTEF's *2019 Monitor Survey* (see section 2.7 for more details) conform with the teachers' description of the selection of DER at their schools, where the selection increases the higher the grade. However, it is necessary to mention that upper secondary level was not a part of the survey. It cannot be stated for certain that upper secondary level is the most equipped but considering the increasing numbers of resources in the survey, and Marit's description of the selection of DER at her school it is highly possible.

The teachers' digital literacy impacts how DER are implemented in the ESL classroom, but the findings of this study also imply a connection between how the teachers implemented DER in their teaching and the accessibility of DER. For instance, Hilde, with the limited number of tablets available for her pupils, was also the one of the three teachers with the most limited experience with DER before my arrival. Similarly, Marit, who had relatively good access to DER at her school, also used it more frequently and appeared more comfortable and experienced with these resources. It is reasonable to think that teachers who have less access to DER also have less experience with the implementation of DER as they are offered limited possibilities to practice.

Kari expressed the most urgent need for an increased selection of DER at her school: *if I were to decide all pupils would have their own digital unit at this school. Preferably an iPad or something that is easy to use and gives the teacher more freedom*. Her pupils at lower secondary level were all equipped with a personal computer, though her pupils at upper primary level shared tablets with the rest of the primary level. She expressed a range of practices and projects

that she had conducted and was planning to organize, though emphasised that the access to DER occasionally limited the tasks she wished to conduct. She appeared to have a wide knowledge and interest in knowing how to implement DER in collaborative and communicatively tasks where DER supported these processes. This aligns with Payton and Hauge's (2010, p. 2, 19) description of digital literacy, where they emphasised the importance of knowing when and why DER is appropriate to apply and what specifically to use it for in order to be a supportive element in the teaching session. Regarding Kari's digital literacy and personal desire to improve her pupils' communicative competence with the support of DER, the limited availability of DER restrained and narrowed her teaching opportunities.

Regarding the teachers' professional development, the interviews demonstrated that none of the teachers were offered much assistance and support to develop their digital literacy. Marit explained that they had been offered a few DER courses during lunch hours but emphasised that lack of time prevented many from attending these meetings. Lack of time is highlighted by Mishra and Koehler (2006, p. 1023) as one the main reasons why teachers show reluctance towards DER. Kari and Hilde were basically self-taught, where Kari on her own initiative had developed her digital literacy which further will help to develop her pupils' digital literacy (Payton & Hague, 2010, pp. 11–12).

Summarizing this section, the findings and the statistics in SINTEF's *Monitor Survey 2019* demonstrate that it is feasible that teachers at upper secondary level triumph in the strive for access to DER. An increased accessibility of DER possibly implies wide-ranging opportunities to implement DER in their ESL teaching. Furthermore, it is suggestive to think that the inequitable distribution of DER might cause lack of development of basic digital skills for the younger pupils. Skills they will need further on and be expected to handle when they attend higher grades.

5.2.5 CLT and the necessity for adapted teaching

The main feature of CLT involves encouraging pupils to communicate in order to allow them to develop their communicative competence (Savignon, 2007, p. 209). Findings in section 4.1.1 demonstrated how all three teachers were concerned with developing their pupils' communicative competence through communication. Another distinct finding however, indicated that the three teachers all struggled to actually get their pupils to speak in the classroom. As Hilde stated *I highly value oral activity in the classroom, but some of the pupils in my class are afraid to speak in front of their classmates.* This correlates with Doqaruni (2014,

p. 2) who argues that a great number of L2 learners often appear reticent and passive in the language classroom. Both fear of losing face and low self-confidence were emphasised by several studies as the main reasons for pupils' reluctance to speak in second language classrooms (Doqaruni, 2014, pp. 2–3; Ewald, 2007, p. 124; Lai, 1994, p. 124). This aligns with some of Kari's pupils which she described as *do not want to speak*. She further stated that they have a reason for it, without specifying the particular reason. However, it is sensible to draw connections between the Doqaruni (2014), Ewald (2007) and Lai's (1994) research and the reluctance of Kari's pupils.

Three specific concepts: confidence, motivation and language ability, are accentuated as especially important dimensions of second language learning (Doqaruni, 2014, p. 3). As these aspects unconsciously impact each other, they are equally important for the teacher to consider in order to maintain the second language classroom. Findings in both interview and field notes demonstrate that all three teachers pay attention to these concepts. However, whether they do so consciously or unconsciously is not verified. Kari emphasised that she continuously focuses on improving her pupils' confidence during their three years at lower secondary level. *It is important to create an atmosphere in the classroom where the pupils can feel secure and not be afraid to speak.* Kari indicated how she valued presenting her pupils with authentic learning situations like skype conversations, where she applauded their conversations rather than paying attention to their pronunciation and grammar errors. This aligns with Lightbown and Spada's (2013, p. 156) description of CLT who stated the importance of communicative practice in contexts where the attention is on understanding and expressing meaning. Kari has the intention of improving the pupils' confidence, implying that it will improve the fluency of communication in the classroom. However, the field notes show little evidence of her attempt in practice, where she in general did most of the talking. The difference between teachers' belief about their CLT teaching and their actual practice is highlighted in Rahman et al.'s study (2018, pp. 295–310) as a common situation. Hence, studies like this or similar reflectional tasks may support teachers in evaluating their own teaching.

Similarly, to Kari, Marit also emphasises the importance of focusing on a slow and steady development of her pupils' confidence, to further create a more communicative ESL classroom. In the interview she highlighted the activity *think-pair-share* in which she describes the benefits as *everyone should have something to contribute with in the class discussion, and if they do not, they can always borrow a few keywords from the pupil next to her/him.* Over time Marit's approach will possibly enhance her pupils' courage to contribute to the classroom discussion,

as they gradually counteract their anxiety as they become familiar with the notion of speaking in front of their classmates. This is especially important as Ewald (2007, p. 124) argues that foreign language teaching generates more anxiety among the pupils than any other subject. The feeling of presenting "a less positive version of themselves to the world" (Ewald, 2007, p. 124) is emphasised as the pupils' main concern.

Findings in the interview further showed correlation with the second concept, motivation, as Hilde described one of her pupils in this manner: *He is really good in English, but he just does not bother to participate.* The notion of motivation show resemblance with Dörnyei's (2003, pp. 12–13) concept of *willingness to communicate*, which he describes as an extension of research within motivation. It is not implicit that a proficient ESL learner necessarily participates in the classroom discussion just because of his/her competent language ability. The pupils also need to feel motivated and engaged in the task. This further correlates with the theory of CLT, which emphasises that pupils need to be engaged through authentic and meaningful topics. The aim is to make them inquisitive and eager to ask questions and start communicating about the topics that interest them (Savignon, 2007, p. 209). Banciu and Jireghie (2012, p. 95) substantiate Savignon's description as they state that pupils' motivation to learn derives from their aspiration to communicate in meaningful ways about meaningful topics. Accordingly, Hilde and other teachers need to concentrate on meaningful and authentic topics in order to enhance the pupils' engagement, which furthermore increases the communication and improves their communicative competence. There is no exact formula on how this should be conducted, but the next section examines some of the tasks that were conducted in the classrooms observed.

5.3 Communicative classroom tasks using DER

A considerable amount of the research presented in this thesis advocates for the use of CLT in the ESL classroom (AbdulRahman, 2015; J. C. Richards, 2006; Savignon, 2007), along with the research concerning DER as a supportive element in the ESL, which are even more confident on the affordances (S. Hennessy, 2011; Sara Hennessy & London, 2013; Mercer et al., 2010). CLT and DER research might give the impression of being the ideal teaching approach, but as the previous section illustrated the teachers of this study experienced challenges with the CLT approach and DER, despite their somewhat idealistic prominence. This section, however, attempts to present some of the actual tasks conducted that went successfully and examine them in light of Mishra and Koehler's (2006) TPACK framework

and Richards (2006) differentiation of CLT practices. Moreover, the three tasks presented here are only a selection of the rewarding tasks that were implemented during my presence in the classrooms.

5.3.1 The interactive map of the US

Hilde's task about the US, focusing on American attractions became immensely popular among her pupils, where the interactive map on the active board developed by the publishers of their textbook Lokus, received a lot of attention from the pupils. The topic, introduced by a video about the US, provided the pupils with an authentic introduction where they saw actual places and American people. A video like this can be support for a real-world simulation like AbdulRahman (2015, p. 976) refers to, as it provides an insight of the real-world in a more realistic approach than any conventional resource could have done. However, it is important that videos are used as an integrated part of the lesson that enables communication, and not just as a video without a purpose (Hansen, 2010, pp. 19–21).

The video initiated a teacher-conducted conversation where Hilde encouraged the pupils to share their knowledge about the US and their impressions of the video. In the light of Richard's (2006, p. 16) organization of communicative practices into categories: mechanical-, meaningful- and communicative practice, Hilde's lesson can be identified as the first category: mechanical practice. The argument is that it involves a controlled practice activity. The findings demonstrate that Hilde supervises all communication by asking all the questions, but does not manage to develop a more fluent conversation with her pupils. Richards (2006, p. 16) emphasises that mechanical practices often involve tasks that the pupils are able to carry out well without completely understanding the language being used. This aligns with Hilde's pupils who still are in the beginner phase of their ESL development.

Regarding the aspect of including DER as part of the ESL teaching, Mishra and Koehler (2006, p. 1018) emphasised that there has been a tendency to not consider how the DER are actually used in the classroom. Along with Howland et al. (2014, p. 2) and AbdulRahman (2015, p. 976) they emphasise the importance of meaningful tasks that engage the pupils and further improve their learning. To help teachers understand how to meaningfully integrate DER, the TPACK framework was developed ((Mishra & Koehler, 2006, p. 1020). In light of the TPACK model, Hilde's lesson would be illustrated as in figure 5 below:

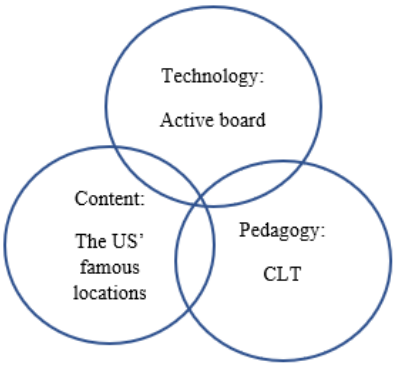


Figure 5. The TPACK model - Modified for Hilde's ESL lesson

As the TPACK illustration (figure 5) demonstrates, the three aspects are in a symbiotic relationship to each other which encourages teachers to avoid teaching technology in isolation (Mishra & Koehler, 2006, pp. 1025–1029). The findings from this particular lesson demonstrate that despite the pupils' engagement in the task itself, little communication was produced as the pupils' major task was to drag the location to the right spot, and they were not asked to say much, or anything at all. The notion of content and technology were substantially covered, but the notion of pedagogy, CLT, lacked attention, which unbalanced the symbiotic relationship. In my field notes, the task was described as *basically a quite easy task, but fun for the pupils to get the chance to use the Active board themselves. Not that much communication, but it is absolutely possible to make it more communicative.* The excitement of the success with the interactive map and her pupils' excitement seemed to overshadow the focus on communication. The pupils demonstrated so much engagement given the opportunity to manage the active board themselves, and considering their joy it is reasonable that the teachers in this moment forgot the aspect of communication.

The interview further showed that Hilde, despite her satisfaction with her pupils' participation and engagement for the task, did see reasons for improvement concerning the aspect of communication.

> *I could definitely have made improvements. They could probably have been asked to say something about the attractions they located, and I think I could have used the task to include the pupils that struggle to speak English a little more, by trying to ask them simple questions about colours they saw on the map or something like that.*

Her open mind towards changes is constructive for the development of her teaching. Using the TPACK framework when planning a lesson, but even more importantly afterwards to evaluate

the teaching, will help teachers to reflect on the symbiotic relationship of their lesson. This can help them to provide a balanced lesson, where all three "knowledges" are equally represented.

Lai (1994, p. 124) states that one of the main reluctances that pupils have regarding communication in the ESL classroom is the fear of losing face when giving wrong answers. With this in mind, the visual map opens up, as Hilde stated, for the possibility *to ask quite intuitive questions*. Not necessarily to test their knowledge, but rather provide them an opportunity to become used to speaking in front of their classmates in a slow pace and to further practice their communicative competence. The fact that Hilde's pupils are relatively young makes it comprehensible that they at this stage do not use their second language fluently in the classroom. Answers in Norwegian or shorter answers in English are to be expected. Even though Krashen (1982, p. 10) indicates that there is an unconscious language acquiring process going on when the language acquirer uses the language for communication, shorter sentences profits this process for younger learners.

Furthermore, a positive feature with Hilde is her attitude towards her professional development. She is the participant in this study with the longest seniority, but the least experienced within the use of DER, however she was eager to develop. In the interview she stated *it is good that you ask these questions because it makes me think. It is perhaps easy to think that it went well, and then forget that you can do it better the next time with some changes.* This aligns with Hansen's (2010, p. 19-21) three conditions related to functional resources, where he emphasises the need to analyse: what does the DER do? What do we use it for? And what is the intention of what we do? Even for a professional and experienced teacher, it is useful to rewind sometimes and analyse your own lessons to see how they can be improved.

Hilde's sentiment is substantiated in my reflection note as I wrote:

> *The teacher is thrilled about my presence in her class and has told both me and her pupils how happy she is that she is now "forced" to use the Active board. Perhaps not the best basis for my thesis, but I am happy this project has developed her view on her own teaching. It will be beneficial for her pupils.*

5.3.2 LearnLab

Kari conducted a lesson where the topic was *segregation in the US*. A comprehensive and important topic, but also very extensive, containing lots of historical facts and details. The DER LearnLab was implemented in the lesson to create a collective focus towards the topic. Using

LearnLab the pupils were showed pictures related to the topic and asked to discuss them in groups before they were to share their thoughts with the class in plenary. Findings in the field notes show that communication in the activity was lacking. I wrote in my field notes that *the pictures give the pupils the possibility to reflect as the pictures do not provide any right or wrong answer.*

The teacher's motive seems meaningful. The pictures initiate curiosity and questions from the pupils, which can further develop into a conversation (Savignon, 2007, p. 209). In terms of authenticity, the pictures presented depictions of real life happenings, but the fact that the pictures illustrated events that happened more than fifty years back in time, possibly made it difficult for the pupils to properly engage in the topic and further experience it as a meaningful task (AbdulRahman, 2015, p. 976). In my opinion, when picking a topic like this the teacher should aim to connect the history of segregation to the present society and -events in order to make meaningful connections between historical events and present society. This could potentially make the topic more meaningful and comprehensive for the pupils (Banciu & Jireghie, 2012, p. 94). Regarding Richards (2006, p. 16) categorization of communicative practices this lesson can be identified as a mechanical practice. Along with Hilde's lesson, this lesson was also distinguished by a controlled practice activity where the teacher supervised much of the communication. With a more meaningful approach the lesson perhaps would have increased communication.

Related to the TPACK model Kari's lesson could be illustrated as in the figure below (see Figure 6), where LearnLab serves as the chosen technology, the segregation in the US as the content and CLT as the pedagogy of the lesson.

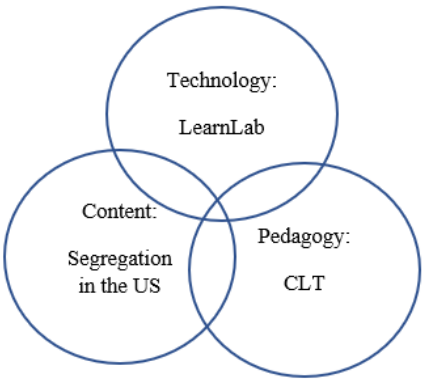


Figure 6. The TPACK model - Modified for Kari's ESL lesson

The three of them should according to Mishra and Koehler (2006, p. 1020) work together in unity, but in this lesson the CLT approach could have been further developed as the communication was inadequate. Bjørke et al. (2014, p. 27) and Richards (2006, p. 5) state that the teacher serves as a language model for their pupils and needs to expose their pupils to the target language as much as possible. Moreover, Hattie and Yates (2014, pp. 274–275) emphasised the chameleon behaviour, where you unconsciously adjust your voice to the person you are listening or talking to. Kari spoke English the whole lesson, but the response from her pupils remained at a minimum. The field notes from the lesson described it this way: *It seems like the teacher does not use the right strategies to keep the communication proceeding. Her questions are often close to yes/no questions that do not promote communication.* The absence of communication might have been reduced if the teacher had generated the communication by asking more open and interrogative questions. This would have created opportunities for the pupils to ask for information and clarifications to negotiate meaning (Savignon, 2007, p. 209).

The field notes further present:

> S*he sometimes uses difficult terms which I think would help the pupils if she spent some time explaining them or explore them along with the pupils to understand the concept of the terms. I believe that part of the reason for the silence is because many of the pupils are unsure about the topic they are talking about.*

The consequence of the pupils' insecurity of not fully understanding what the teacher is conveying is that it may increase the pupils' anxiety of speaking in front of the class and further restrain the communication (Ewald, 2007, p. 124). As Hattie and Yates emphasise, it is necessary to adjust your speech in order to connect with your pupils, both in terms of word choice and tempo. In a CLT approach the teacher plays the most essential role of initiating communication and creating real-life situations for the pupils, but it also requires a lot of creativity from the teachers to utilize the classroom potential (AbdulRahman, 2015, p. 977).

Howland et al. (2014, pp. 5–7) accentuate that the most beneficial utilization of technology is to use *technology-as-partner,* rather than *technology-as-teacher.* The findings demonstrate that the LearnLab software has potential to be implemented is the ESL lesson *as partner* if used beneficially. Kari praised the software in the findings *I am in general very pleased with the program. I primarily use it in tenth grade because they are so many pupils and this program provides everyone with a good view of the interactive whiteboard.* In my field notes I agree with Kari as I explained it as *a practical resource that allows the teacher to manage the pupils'*

computer screens (…). It makes it easier to teach bigger classes. LearnLab provides benefits, but perhaps classroom discussions do not serve its purpose in densely populated classrooms. AbdulRahman (2015, pp. 978–979) states that teachers in his study reported that one of the main challenges with the implementation of CLT was the large number of pupils in their classroom. This was however, primally because of the voice volume provided by the quantity of pupils, but it is reasonable to connect this to Ewald's (2007, p. 124) argument about anxiety, where anxiety is likely to increase with more people the pupils have to speak in front of. The DER LearnLab was anyway a new DER to me and it was interesting to observe and become familiar with. As the findings in my field notes said *I like the idea of Learn Lab, but it could have been exploited even better.*

5.3.3 Spontaneous communication by using "Shock Talk"

Marit's warm-up activity "Shock talk" was simple of design but contained many of the major aspects of CLT[20]. Marit created authentic topics in advance of the lesson or facilitated for communication by discussing and agreeing to the topics in cooperation with her pupils, both alternatives in line with theory of CLT (AbdulRahman, 2015, p. 977). In the findings from the field notes I described the task as *very nice and effective activity to get the pupils to talk, as well as it is very adaptive to all types of topics*. During the activity, she functioned as the observer and moderator as she listened to their conversations and guided them on to the next term to discuss. Through speaking the target language during the entire lesson, she provided the pupils with authentic language input and served as a model for correct speech (AbdulRahman, 2015, p. 977; J. C. Richards, 2006, p. 5).

The task was solely communicative, where her pupils managed much of the talking themselves. The findings from the interview demonstrate that Marit instead of focusing on her pupils' pronunciation, was more concerned with her pupils' fluency and their spontaneous interaction, in which this activity provided them with practice of authentic conversations. This aligns with Richard's (2006, p. 16) third classification of the CLT practice, defined as *communicative practice*, which he describes as practices that are concerned with fluent conversations within real-life contexts. The focus on fluent conversation also helps to develop the pupils' discourse competence, as they practice the ability to connect ideas and express themselves in a second language (Canale, 1983, p. 1; Mustafa, 2015, pp. 17–18).

[20] See section 4.3.3 for detailed description of the task

The fact that the pupils were divided into groups probably made the communication more comfortable, hence more educational for the pupils. The field notes also indicate this as I wrote *apparently all pupils participated, and this activity makes it easier to include everyone as they do not have to speak in front of more than one or two classmates. Hence, less frightening.*

The findings show that the shock talk activity emphasised the important aspects of communication within the CLT approach. The task, however, was not strongly connected to DER, though the digital stopwatch presented on the interactive whiteboard served as the digital alibi. Illustrated in the TPACK framework the lesson is depicted in Figure 7:

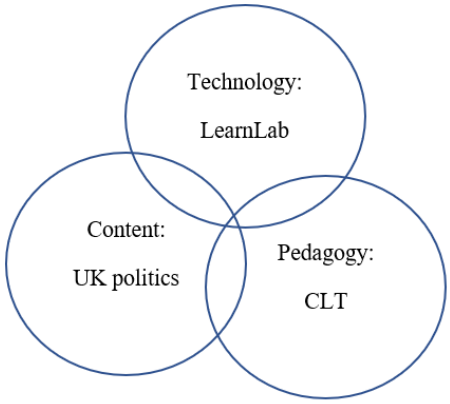


Figure 7. The TPACK model - Modified for Marit's ESL lesson

Unlike Hilde and Kari's presented teaching, the aspect of technology in this activity was less prominent than the aspects of pedagogy and content, and perhaps caused the unbalance in the symbiotic relationship. However, as the TPACK framework only serves as a support to help the teachers to integrate DER in their lesson (Mishra & Koehler, 2006, p. 1020), it does not suggest that the lesson is less constructive if the balance is not satisfied.

The stopwatch presented on the interactive whiteboard made the time visual for everyone, so it was easy to follow how much time they had left. Furthermore, the field notes showed that the informal competition of stopping the time as close to thirty seconds as possible made the task more engaging. The competition was initiated by the pupils themselves. The DER functioned as a supportive element in the background of the activity, whereas the communication among the pupils received the major attention. Marit's choice of implementation of DER however, resembles her perspective on DER, as findings in her interview demonstrated that she prefers a balance between the use of DER and conventional resources and to not incorporate DER in all lessons unrestrained.

5.4 Chapter Summary

This chapter has discussed the findings in light of the relevant theory, previous research and my own reflections. This is done in three main focus areas: Teachers' focus on CLT and their concept of DER (5.1), Teachers' experience of challenges concerning DER as a supportive element of CLT (5.2) and Communicative classroom tasks using DER (5.3). The following and final chapter provides answers to the research question, presents limitations of the study, recommendations for further research and my final remarks.

6. Conclusion

This research project set out to explore how Norwegian ESL teachers use DER as a supportive element in the facilitation of CLT. In order to search for the answer, classroom observations and interviews were conducted with three ESL teachers.

As my research project has come to an end, I will in the following section conclude my study by revisiting the research question. Furthermore, the limitations of the study and suggestions for further research are presented before the thesis is finalized with my final remarks.

6.1 Summary of findings

Initially, I asked the following research question: *How do English second language teachers incorporate digital educational resources in the English second language classroom to facilitate Communicative Language Teaching?*

The teachers in this study had different practice backgrounds as they taught in both upper primary, lower secondary and upper secondary level. However, they were all relatively experienced ESL teachers. Regarding their concern with communication, they agreed upon the importance of focusing on oral communication, stating that they preferred to do it through warm-up activities, repetitional conversations or small discussions. In line with the theoretical aspects of CLT, they were primarily concerned with developing the pupils' oral communication, as they avoided correcting pronunciation and grammar errors. They generally managed to generate communication by asking open-ended questions that required the pupils to reflect. On some occasions they could have tried to facilitate a more fluent conversation between the pupils in order to function as the facilitator. However, the teachers all emphasised that they preferred, and were most accustomed to hold the leading role of the classroom.

Similar to their different teaching backgrounds, their experience with DER showed divergence as well. They agreed on the many opportunities that DER contributed, but possessed divergent digital literacy, and their opinions differed on the aspect of how much DER should be incorporated in their teaching. The interactive whiteboard was the most frequently used resource applied during the classroom observations, but other tasks using laptops or tablets and software like eTwinning and Padlet were mentioned in the interviews. It was further emphasised that the necessity of having access to sufficient DER is crucial, both in applicability and quantity. The quantity of DER was stated by some of the teachers as a restriction for the development of communicative tasks using DER. Their schools had a limited supply of DER

that was shared between several grades. This was particularly an issue in upper primary and lower secondary level, whereas the upper secondary level was sufficiently supplied.

Despite their constructive perspective and conduction of oral communication in their classes, the study reveals that the teachers encounter several challenges implementing CLT and with DER as a supportive element. They had all experienced how difficult it could be to engage their pupils for communication, where pupils' fear of losing face or giving the wrong answer were emphasised as common worries. It was also emphasised that DER occasionally had the opposite effect on CLT as it provided alternative ways to communicate with your peers, such as pointing at the screen, rather than talking. Moreover, the teachers indicated a contradiction whereas DER was highlighted as a cause for distraction by some of them while others underlined how DER increased the pupils' participation and interest. Even though this study has not considered the pupils' age, and DER's potential different influence on the pupils, this study presumes that there is some connection. Additionally, the youngest pupils of this study were the least exposed to working with DER, which possibly contributed to their excitement. An aspect that was especially emphasised in relevant theory and by some of the teachers was the importance of the notion of purpose in order to incorporate meaningful tasks using DER. It was stated that DER does not automatically improve the teaching. However, when used with a purpose DER can function as a valuable resource to promote communication.

The communicative tasks using DER illustrated that even with a small sample of participants they demonstrated a variety and wide range in teaching. A reasonable explanation to the differences is due to varied digital literacy and the use of communication. A discrepancy was registered between the individual teacher's intention and the outcome of the performed task evaluated in light of the TPACK framework. In some of the tasks DER was represented to a high extent and in others just the opposite. Equivalently, communication was prominent in one of the tasks, wherein the two other tasks the communication was predominated by the use of DER.

6.2 Limitations of the study and suggestions for further research

In any other researched study there is always room for improvement and limitations, and the current study is no exception. In this section I will address some of the limitations of this study. First of all, three participants is a small sample and the result cannot be generalized for the majority of all Norwegian ESL teachers. Additionally, the ESL teachers in this study worked at three different levels: upper primary, lower secondary and upper secondary level. One of the

advantages of using a multiple case study was the possibility to cross-case analyse and compare the cases to increase the generalisability. However, the basis of comparison was challenging as the pupils' age and communicative ability level differed. Hence, there was a natural variation and limitation in how the teachers could promote communication in their classrooms. The sample of participants was also a relatively uniform group of people consisting of three female teachers ranging from low to medium seniority. A more diverse sample could potentially have provided different data. However, it is a representative sample of the present Norwegian school, as female teachers constitute the majority of Norwegian teachers (Skjong, 2018, p. 12). Using a different sampling strategy would probably have provided a different basis of participants, but for practical reasons, convenience sample was the option for this study.

Another limitation of this study is related to my limited experience of conducting a qualitative interview. In retrospect, I realise that it would have been beneficial to have asked for elaboration or clarification to many of the answers. I was concerned with providing a comfortable interview situation for the participants, and for that reason a little apprehensive to follow-up their answers too much. However, to secure quality I focused on asking open-ended questions that would generate reflection and inner thoughts, but I realised when transcribing the interviews that my neglect of follow-up questions resulted in answers that were rather incomplete and of less use in the analysis. This relates to the small sample of interviewees mentioned previously, and I as the researcher, become quite vulnerable to data access. Another limitation regarding the data material, relates to audio recordings of the classroom observation. I audio recorded every lesson I observed as I considered field notes to be not thorough enough to capture all the details of the classroom conversations. The audio recordings left me with hours of audio data, but unfortunately due to technical problems they were damaged and could not be used. It might have added valuable information to the discussion of the thesis.

The sections of previous research presented in this study (section 2.10 and 2.11) demonstrate that there is evidently a need for research within the field of oral communication in a Norwegian school context. Different aspects within CLT would have been interesting to explore, for instance, does the age of the pupils' influence the CLT approach? However, I find it more relevant to focus on how this research project can be further developed. It would have been interesting to do this study again with approximately the same interview guide, but with several more participants. Moreover, including interviews with pupils could possibly help to receive some answers to the challenges the teachers faced with CLT and DER in this study, as well as pupils' perception of DER as a supportive element of CLT. Finally, it would be particularly

interesting to see the outcome of the shutdown of schools due to the COVID-19 pandemic. The first study conducted on the topic of digital home schooling in Norway indicated that the digital teaching conducted during the shutdown varied from teacher to teacher (Dalland et al., 2020). However tragic the consequences of the pandemic have been, at least teachers seem to have had a tremendous development within the use of DER as part of the provisional digital school. Hence, conducting this study again would presumably demonstrate teachers with even more experience and confidence with DER.

6.3 Final remarks

My motivation for this research project has been to elucidate an aspect of the ESL teaching that I assume have been partially neglected in the Norwegian school system. Previous research presented in this study affirm my theory. I find it so important that the pupils are capable to apply their ESL, as English is a world language. Most pupils will eventually encounter situations, either at university, at work, while traveling etc., where it is expected and appropriate to communicate in their second language. Communicating, in terms of stating their opinions, and discussing and reflecting, not simply answering questions. I consider the pupils' ability to communicate in both first and second language as one of the core priorities of the Norwegian school.

The current study has shown teachers' varied use and concern with CLT and DER. It has demonstrated that there is great potential in using DER as a supportive element in the facilitation of CLT, which can contribute to communication practice related to and authentic topics. The limitations and opportunities lie within the teacher's digital literacy and the access to applicable DER. I hope that my study can contribute with an increased awareness of the importance and the possibilities that exist within oral communication practice in the ESL classroom and additionally highlight the importance of incorporating meaningful tasks with DER as a supportive element of CLT.

7. References

AbdulRahman, A. A. A. (2015). Communicative Language Teaching in EFL University Context: Challenges for Teachers. *Journal of Language Teaching and Research*, *6*(5), 976–984. https://doi.org/http://dx.doi.org/10.17507/jltr.0605.09

Adnan, A. H. M., Ilias, N., & Ramli, M. S. (2012). Communicative Language Teaching: Difficulties, Problems and Limitations Regarding Its Implementation in the Malaysian ELT Context. *International Conference on Active Learning*, 306–313. https://www.researchgate.net/publication/313798814_Communicative_Language_Teaching_difficulties_problems_and_limitations_regarding_its_implementation_in_the_Malaysian_ELT_context

Aksnes, L. M. (2016). Om muntlighet som fagfelt. In K. (red. . Kverndokken (Ed.), *101 måter å fremme muntlige ferdigheter på - om muntlig kompetanse og muntlighetsdidaktikk* (pp. 15–34). Fagbokforlaget.

Banciu, V., & Jireghie, A. (2012). Communicative Language Teaching. *The Public Administration and Social Policies Review*, *8*(1), 94–98. https://search.proquest.com/docview/1271627877?rfr_id=info%3Axri%2Fsid%3Aprimo

Bjørke, C., Dypedahl, M., & Myklevold, G.-A. (2014). Hva er fremmedspråksdidaktikk? In C. Bjørke, M. Dypedahl, & G.-A. Myklevold (Eds.), *Fremmedspråksdidaktikk* (pp. 19–29). Cappelen Damm AS.

Bjørke, C., & Grønn, B. (2014). Muntlige ferdigheter i språkfagene. In C. Bjørke, M. Dypedahl, & G.-A. Myklevold (Eds.), *Fremmedspråksdidaktikk* (pp. 30–42). Cappelen Damm AS.

Blikstad-Balas, M. (2015). Digital Literacy in Upper Secondary School – What Do Students Use Their Laptops for During Teacher Instruction? *Nordic Journal of Digital Literacy*, *10*(Special issue), 122–137. www.idunn.no/dk

Børresen, B. (2016). Samtalen i klasserommet. In *101 måter å fremme muntlige ferdigheter på - om muntlig kompetanse og muntlighetsdidaktikk* (pp. 89–101). Fagbokforlaget.

Canale, M. (1983). From Communicative Competence to Communicative Language Pedagogy. In J. C. Richards & R. W. Schmidt (Eds.), *Language and Education* (pp. 2–27). Routledge. https://www.academia.edu/38648253/Canale_M._1983_-

_From_Communicative_Competence_to_Communicative_Language_Pedagogy_._In_J._C._Richards_and_R._W._Schmidt_eds._

Christoffersen, L., & Johannessen, A. (2012). *Forskningsmetode for lærerutdanningene*. Abstrakt forlag.

Corbin, J., & Strauss, A. (2008a). *Basics of Qualitative Research: Techniques and Procedures for Developing Grounded Theory* (3rd ed.). SAGE Publications, Inc. https://doi.org/10.4135/9781452230153

Corbin, J., & Strauss, A. (2008b). Elaborating the analysis. In *Basics of Qualitative Research: Techniques and Procedures for Developing Grounded Theory* (3rd ed., pp. 195–228). SAGE Publications Inc. https://doi.org/10.4135/9781452230153

Corbin, J., & Strauss, A. (2012). Intergrating Categories. In *Basics of Qualitative Research: Techniques and Procedures for Developing Grounded Theory* (3rd ed., pp. 263–274). SAGE Publications, Inc. https://doi.org/https://dx.doi.org/10.4135/9781452230153

Council of Europe. (2001). *The Common European Framework of Reference for Languages: Learning, teaching, assessment*. https://rm.coe.int/1680459f97

Creswell, J. W. (1998). *Qualitative Inquiry and research Design: Choosing Among Five Tradiotions*. SAGE Publications Inc.

Creswell, J. W. (2007). *Qualitative Inquiry & Research Design: Choosing Among Five Approaches* (2nd ed.).

Dalland, C. P., Klette, K., Bilkstad-Balas, M., & Roe, A. (2020). *Hjemmeskole under korona: De minste elevene hadde minst kontakt med læreren - Institutt for lærerutdanning og skoleforskning*. UiO: Institutt for Lærerutdanning Og Skoleforskning. https://www.uv.uio.no/ils/om/aktuelt/aktuelle-saker/2020/hjemmeskole-under-korona-de-minste-elevene-hadde-m.html

DeMarrais, K. & Lapan, S. D. (2004). *Foundations for Research: Methods of Inquiry in Education and the Social Sciences* (N. Silverman (ed.)). Lawrence Erlbaum Associates Publishers, Inc., Pubilshers.

Denzin, N. K., & Gold, R. L. (2018). Roles in Sociological Field Observations. In *Sociological Methods* (pp. 363–380). https://doi.org/10.4324/9781315129945-33

Doqaruni, V. R. (2014). A Quantitative Action Research on Promoting Confidence in a Foreign Language Classroom: Implications for Second Language Teachers. *I.e.: Inquiry in Education*, *5*(1), 1–20. https://digitalcommons.nl.edu/ie/vol5/iss1/3/

Dörnyei, Z. (2003). Attitudes, Orientations, and Motivations in Language Learning: Advances in Theory, Research, and Applications. *Language Learning*, *53*(1), 3–32. https://doi.org/10.1111/1467-9922.53222

Dudeney, G., Hockly, N., & Pegrum, M. (2013). *Digital Literacies: Research and Resources in Language Teaching.* Pearson.

Ewald, J. D. (2007). Foreign Language Learning Anxiety in Upper-Level Classes: Involving Students as Researchers. *Foreign Language Annals*, *40*(1), 122–142. https://doi.org/10.1111/j.1944-9720.2007.tb02857.x

Fjørtoft, S. O., Thun, S., & Buvik, M. P. (2019). *Monitor 2019: En deskriptiv kartlegging av digital tilstand i norske skoler og barnehager*. https://www.udir.no/contentassets/92b2822fa64e4759b4372d67bcc8bc61/monitor-2019-sluttrapport_sintef.pdf

Gass, S. M., Behney, J., & Plonsky, L. (2013). *Second Language Acquisition: An Introductory Course* (4th ed.). Routledge. https://books.google.no/books?hl=no&lr=&id=6U-BAAAAQBAJ&oi=fnd&pg=PP1&dq=second+language+acquisition&ots=tyboaJGGHI&sig=xxzTpBXwKsB634OlRf46yP7pcMg&redir_esc=y#v=onepage&q&f=false

Gilje, Ø. (2017). *Læremidler og arbeidsformer i den digitale skolen*. Fagbokforlaget.

Gilje, Ø., Dolonen, J. A., Furberg, A., Rasmussen, I., Kluge, A., Knain, E., Mørch, A., Naalsund, M., & Skarpaas, K. G. (2016). *Med ARK & APP: Bruk av læremidler og ressurser for læring på tvers av arbeidsformer*. https://www.uv.uio.no/iped/forskning/prosjekter/ark-app/arkapp_syntese_endelig_til_trykk.pdf

Hansen, J. J. (2010). *Læremiddellandskabet*. Akademisk Forlag.

Hanson, W. E., Plano Clark, V. L., Petska, K. S., Creswell, J. W., & Creswell, J. D. (2005). Mixed methods research designs in counseling psychology. In *Journal of Counseling Psychology* (Vol. 52, Issue 2, pp. 224–235). https://doi.org/10.1037/0022-0167.52.2.224

Hattie, J., & Yates, G. C. R. (2014). *Visible Learning and the Science of How We Learn*. Routledge.

Hennessy, S. (2011). The role of digital artefacts on the interactive whiteboard in supporting classroom dialogue. *Journal of Computer Assisted Learning*, *27*(6), 463–489. https://doi.org/10.1111/j.1365-2729.2011.00416.x

Hennessy, Sara, & London, L. (2013). Learning from International Experiences with Interactive Whiteboards: The Role of Professional Development in Integrating the Technology. *OECD Education Working Papers*, *89*, 5–24. https://www.oecd-ilibrary.org/education/learning-from-international-experiences-with-interactive-whiteboards_5k49chbsnmls-en

Howland, J. L., Jonassen, D. H., & Marra, R. M. (2014). *Meaningful Learning with Technology* (4th ed.). Pearson Education.

Johannessen, A., Tufte, P. A., & Christoffersen, L. (2016). *Introduksjon til samfunnsvitenskapelig metode* (5th ed.). Abstrakt forlag.

Krashen, S. (1982). *Principles and Practice in Second Language Acquisition*. Pergamon Institute of English.

Krumsvik, R. J. (red. . (2007). *Skulen og den digitale læringsrevolusjon*. Universitetsforlaget.

Kvale, S., & Brinkmann, S. (2009). *Interviews: Learning the Craft of Qualitative Research Interviewing* (2nd ed.). SAGE Publications Inc.

Kverndokken, K. (red. . (2016). *101 måter å fremme muntlige ferdigheter på: Om muntlig kompetanse og muntlighetsdidaktikk*. Fagbokforlaget.

Lai, C. (1994). Communication Failure in the Language Classroom: an Exploration of Causes. *RELC Journal*, *25*(1), 99–129. https://doi.org/10.1177/003368829402500105

Lee, R. (2016). Implementing Dialogic Teaching in a Singapore English Language Classroom. *RELC Journal*, *47*(3), 279–293. https://doi.org/10.1177/0033688216631171

Lichtman, M. (2010). *Qualitative Research in Education. A user´s guide*. SAGE Publications.

Lightbown, P. M., & Spada, N. (2013). *How languages are learned* (4th ed.). Oxford University Press.

Ludvigsens-utvalgets rapport. (2015). *Fremtidens skole*. https://www.regjeringen.no/contentassets/da148fec8c4a4ab88daa8b677a700292/no/pdfs/nou201520150008000dddpdfs.pdf

Mercer, N., Hennessy, S., & Warwick, P. (2010). Using interactive whiteboards to orchestrate classroom dialogue. *Technology, Pedagogy and Education*, *19*(2), 195–209. https://doi.org/10.1080/1475939X.2010.491230

Merriam, S. B. (2009). *Qualitative Research: A Guide to Design and Implementation* (2nd ed.). Jossey-Bass.

Mishra, P., & Koehler, M. J. (2006). Technological Pedagogical Content Knowledge: A Framework for Teacher Knowledge. *Teacher College Record*, *108*(6), 1017–1054. http://one2oneheights.pbworks.com/f/MISHRA_PUNYA.pdf

Mustafa, A. (2015). The Evolvement of the Term "Communicative Competence." *International Journal of Social Sciences & Educational Studies*, *2*(1), 16–19. https://www.researchgate.net/profile/Ahmet_Demir/publication/314712257_Optimizing_Human_Resources_Capacity_and_Performance_of_Newroz_Telecom_Company_by_Proposing_Queuing_Theory/links/58c4e80aa6fdcce648e51467/Optimizing-Human-Resources-Capacity-and-Perform

Myrset, A., & Drew, I. (2016). A case study of Readers Theatre in a primary Norwegian EFL class. *Nordic Journal of Modern Language Methodology*, *4*(1). https://doi.org/10.46364/njmlm.v4i1.292

Forskningsetiske retningslinjer for samfunnsvitenskap , jus og humaniora, (2016). www.etikkom.no

Norwegian Directorate for Education and Training. (2006). *Læreplan i fremmedspråk (FSP1-01)*. https://www.udir.no/kl06/FSP1-01

Norwegian Directorate for Education and Training. (2012). *Framework for Basic Skills*. https://www.udir.no/contentassets/fd2d6bfbf2364e1c98b73e030119bd38/framework_for_basic_skills.pdf

NOU Kunnskapsdepartementet. (2003). Mål, verdier og ambisjoner. *I Første Rekke Forsterket Kvalitet i En Grunnopplæring for Alle*, *16*, 11–16.

OECD. (2015). *Students, Computers and Learning: Making the Connection*. OECD

Publishing. https://doi.org/https://doi.org/10.1787/9789264239555-en

Regulations for the Education Act, (2006) (testimony of Forskrift til Opplæringsloven). https://lovdata.no/dokument/SF/forskrift/2006-06-23-724/KAPITTEL_20#KAPITTEL_20

Payton, S., & Hague, C. (2010). *Digital literacy across the curriculum: a Futurelab handbook.* www.futurelab.org.uk/

Postholm, M. B. (2010). *Kvalitativ metode: En innføring med fokus på fenomenologi, etnografi og kasusstudier* (2nd ed.). Universitetsforlaget.

Postholm, M. B., & Jacobsen, D. I. (2018). *Forskningsmetode for masterstudenter i lærerutdanning*. Cappelen Damm AS.

Rahman, M. M., Singh, M. K. M., & Pandian, A. (2018). Exploring ESL Teacher beliefs and Classroom Practices of CLT: A Case Study. *International Journal of Instruction, 11*(1), 295–310. https://doi.org/10.12973/iji.2018.11121a

Richards, J. C. (2006). *Communicative Language Teaching Today*. Cambridge University Press.

Richards, L., & Morse, J. M. (2013). *Readme first for a user's guide to qualitative methods* (3rd ed.). SAGE Publications.

Rindal, U. (2014). What is English? *Acta Didactica Norge*, *8*(2), 1–17. https://doi.org/https://doi.org/10.5617/adno.1137

Røkenes, F. M. (2019). PhD revisited: Preparing future teachers to teach with ICT: An investigation of digital competence development in ESL student teachers in a Norwegian teacher education program. In U. E. Rindal & L. M. Brevik (Eds.), *English Didactics in Norway – 30 years of doctoral research* (pp. 162–182). Universitetsforlaget. https://doi.org/DOI: 10.18261/978-82-15-03074-6-2019-09

Røkenes, F. M., & Krumsvik, R. J. (2016). Prepared to teach ESL with ICT? A study of digital competence in Norwegian teacher education. *Computers & Education, 97*, 1–20. https://doi.org/http://dx.doi.org/10.1016/j.compedu.2016.02.014

Rongved, E. (2019). *Ungene snakker for lite i klasserommet*. Forskning.No. https://forskning.no/barn-og-ungdom-partner-pedagogikk/ungene-snakker-for-lite-i-

klasserommet/1563539

Saldaña, J. (2016). *The Coding Manual for Qualitative Researchers* (3rd ed.). SAGE Publications.

Säljö, R. (2016). *Læring: en introduksjon til perspektiver og metaforer*. Cappelen Damm AS.

Savignon, S. J. (2007). Beyond Communicative Language Teaching: What's ahead? *Journal of Pragmatics*, *39*, 207–220. https://doi.org/10.1016/j.pragma.2006.09.004

Shabani, K., Khatib, M., & Ebadi, S. (2010). Vygotsky's Zone of Proximal Development: Instructional Implications and Teachers' Professional Development. *English Language Teaching*, *3*(4), 237–248. https://files.eric.ed.gov/fulltext/EJ1081990.pdf

Skjong, H. (2018). Magister masculus: den mannlige læreren. *Utdanning*, *3*, 10–17. https://www.utdanningsnytt.no/files/2019/06/27/Utdanning 3 2018.pdf

Svenkerud, S., Kirsti, K., & Hertzberg, F. (2012). Opplæring i muntlige ferdigheter. *Nordic Studies in Education*, *32*(1), 35–49. https://www.idunn.no/file/pdf/53214176/opplaering_i_muntlige_ferdigheter.pdf

Svenkerud, S., & Opdal, L. (2016). Digitale verktøy i arbeid med muntlige ferdigheter. In *101 måter å fremme muntlige ferdigheter på - om muntlig kompetanse og muntlighetsdidaktikk* (pp. 103–117). Fagbokforlaget.

Thagaard, T. (2013). *Systematikk og innlevelse: En innføring i kvalitativ metode* (4th ed.). Fagbokforlaget.

Thornbury, S., & Slade, D. (2006). *Conversation: from description to pedagogy*. Cambridge University Press.

Utdanningsdirektoratet. (2006). *Læreplan i engelsk (ENG1-03).* https://www.udir.no/kl06/ENG1-03/Hele/Grunnleggende_ferdigheter

Van Maanen, J. (1979). Reclaiming Qualitative Methods for Organizational Research: A Preface.: EBSCOhost. *Administrative Science Quarterly*, *24(4)*(5), 520–526. http://web.a.ebscohost.com/ehost/pdfviewer/pdfviewer?vid=1&sid=7a2684c9-83db-4e1e-9ae8-5f86de60cdff%40sdc-v-sessmgr03

Waring, H. Z. (2009). Moving out of IRF (Initiation-Response-Feedback): A Single Case Analysis. *Language Learning*, *59*, 796–824. https://doi.org/10.1111/j.1467-

9922.2009.00526.x

Yin, R. K. (1994). *Case Study Reasearch Design and Methods* (2nd ed.). SAGE Publications Inc.

8. Appendices

Appendix A - Letter of permission from NSD to collect data for the study

NSD NORSK SENTER FOR FORSKNINGSDATA

NSD sin vurdering

Prosjekttittel

Engelsklæreres syn på sammenhengen mellom digitale læremidler teknologi og muntlighet

Referansenummer

517299

Registrert

22.01.2019 av Frøydis Grann - froydisg@stud.ntnu.no

Behandlingsansvarlig institusjon

Norges teknisk-naturvitenskapelige universitet NTNU / Fakultet for samfunns- og utdanningsvitenskap (SU) / Institutt for lærerutdanning

Prosjektansvarlig (vitenskapelig ansatt/veileder eller stipendiat)

Fredrik Mørk Røkenes, fredrr@ntnu.no, tlf: 73598148

Type prosjekt

Studentprosjekt, masterstudium

Kontaktinformasjon, student

Frøydis Grann, froydisg@stud.ntnu.no, tlf: 95486567

Prosjektperiode

01.01.2019 - 09.06.2020

Status

03.04.2020 - Vurdert

Vurdering (1)

03.04.2020 - Vurdert

Det er vår vurdering at behandlingen av personopplysninger i prosjektet vil være i samsvar med personvernlovgivningen så fremt den gjennomføres i tråd med det som er dokumentert i meldeskjemaet den 03.04.2020 med vedlegg, samt i meldingsdialogen mellom innmelder og NSD. Behandlingen kan starte.

Appendix B – Enquiry of participation in a research project

Forespørsel om deltakelse i forskningsprosjekt

Har du lyst til å delta i masterprosjektet mitt om bruk av digital teknologi for muntlig aktivitet i engelskundervisningen?

Bakgrunn og formål

Viktigheten av muntlig samspill og dialog fremheves til stadighet i skoleforskningen som en viktig del av undervisningen og som gir elevene et godt læringsutbytte. Samtidig har teknologi fått en stor plass i dagens skole, som en verdifull ressurs for lærer og elever.

Formålet med denne masteroppgaven er å få innsikt i hvordan digitale teknologier kan tas i bruk for å mediere i prosessen for muntlighet i engelskundervisningen.

Mastergradsstudiet gjennomføres ved Institutt for lærerutdanning, NTNU i Trondheim, ved masterprogrammet fag- og yrkesdidaktikk og lærerprofesjon - studieretning engelsk og fremmedspråk.

Du forespørres om å delta i egenskap av å være lærer i faget engelsk ved barne-/ungdomsskole eller ved videregående skole.

Hva innebærer deltakelse i studien?

Deltakelse i studien innebærer for deg som lærer at forsker deltar som observatør i engelskundervisningen; estimert tidsbruk for innsamling av observasjonsnotater er 4-6 undervisningstimer. Observasjon er kun relevant for timer der digitale verktøy blir tatt i bruk i hele eller deler av undervisningstimen og hvor muntlig aktivitet forekommer i klasserommet. Relevante tidspunkter/dager for observasjon avtales på forhånd med deg. Jeg vil benytte meg av feltnotater under klasseromsobservasjonen.

Når observasjonsrunden er fullført, ønsker jeg å gjennomføre ett kvalitativt intervju med deg. Under intervjuet vil det bli benyttet utstyr for lydopptak. Lydopptakene er viktige for å sikre at ingen viktig informasjon går tapt/overses av forsker. Intervjudataene vil deretter bli transkribert og lydfilen slettes etter at intervjuet er transkribert.

Elevene vil få en muntlig presentasjon av studien før observasjonsperioden innledes. Det generelle formålet skisseres, hvem forsker er, at studien vil være anonymisert, at det er læreren deres som er i fokus og at ingen navn nedtegnes.

Hva skjer med informasjonen om deg?

Alle personopplysninger vil bli behandlet konfidensielt. Tilgang til personopplysninger er begrenset til forsker og eventuelt forskerens veileder ved NTNU. Lydopptak vil slettes etter transkribering. Intervjuer søkes gjennomført uten at noen personopplysninger som for eksempel navn på deltakere og/eller tredjeparter fremkommer, og det vil orienteres om dette i forkant av intervjuet. Det kan imidlertid forekomme at navn nevnes, eventuelt at det fremkommer opplysninger som kan bidra til å identifisere personer under et intervju. Disse

opplysningene vil *ikke* transkriberes. Deltakeren vil få mulighet til å lese gjennom transkripsjonen av intervjuet.

Alle lydopptak lagres hjemme hos forsker på en kryptert minnepinne på et låsbart hjemmekontor og slettes etter at intervjuet er transkribert. Transkriberte data oppbevares utelukkende som dokument på forskers private, passordbeskyttede PC og vil ikke oversendes via e-post/internett. Transkriberte data vil ikke inneholde navn på deltakere eller annen personidentifiserende informasjon som måtte finnes på opptak av intervjuer. Disse blir alle anonymisert under transkriberingen. Det vil ikke opprettes noen navneliste relatert til prosjektet som oppbevares sammen med transkriberte data. Mastergraden vil være anonymisert ved publisering. Det vil bli brukt fiktive navn for skole, deltaker osv.

Etter planen skal masterprosjektet avsluttes juni 2020. Observasjonsnotater og transkriberte intervjuer, som alle er anonymiserte, vil lagres på forskers personlige PC frem til prosjektet er avsluttet og levert, og sluttvurderingen av mastergradsoppgaven foreligger. Etter sluttvurdering vil alt oppbevart datamateriale bli slettet.

Frivillig deltakelse

Det er frivillig å delta i studien og du kan når som helst trekker ditt samtykke uten å oppgi noen grunn. Dersom du bestemmer deg for å trekke deg, vil alle opplysninger om deg bli slettet. Du har rett til å be om innsyn, retting, sletting og begrensning av informasjon i datamaterialet, samt dataportabilitet/kopi av personopplysninger. Hvis det skulle bli nødvendig har du rett til å sende inn klage til Datatilsynet og/eller kontakte NTNUs personvernombud Thomas Helgesen på thomas.helgesen@ntnu.no eller 93079038.

Dersom du ønsker å delta eller har spørsmål til studien, ta kontakt med Frøydis Grann, telefon (+47) 95486567, e-post froydis.grann@gmail.com. Veileder for dette prosjektet er Fredrik Mørk Røkenes, førsteamanuensis i engelsk fagdidaktikk ved institutt for lærerutdanning, NTNU. E-post fredrr@ntnu.no , telefon (+47) 73598148.

Studien er meldt inn og vil gjennomføres i henhold til retningslinjene til Personvernombudet for forskning NSD - Norsk senter for forskningsdata AS.

Samtykke til deltakelse i studien

Jeg har mottatt informasjon om studien, og er villig til å delta. Jeg samtykker til at forsker kan observere i klasserommet hvor det vil bli tatt lydopptak og enkelte bilder av aktiviteter i klasserommet, samt at forsker får ta observasjonsnotater i undervisningen som spesifisert ovenfor. Jeg samtykker videre til å delta i påfølgende forskningsintervju.

(Signert av prosjektdeltaker, dato)

Appendix C – Interview guide

Intervjuguide

Mål:

- Få innsikt i lærerens bevisste bruk av digitale læremidler for å fasilitere for kommunikativ språklæring (CLT) i engelskundervisningen.
- Hvordan kan digitale læremidler potensielt brukes til å understøtte klasseromsdialogen/ muntlig kommunikasjon i engelskundervisningen.

Introduksjon:

- **Uttrykke takknemlighet:** *Tusen takk for at du har stilt opp som informant både gjennom å la meg observere i undervisningen din og å stille opp på dette intervjuet.*
- **Grunner og mål for intervjuet:** *Jeg er veldig interessert i å høre dine konkrete tanker og synspunkt rundt hvordan bruk av digital teknologi kan være med å fremme dialog i engelskundervisningen.*

Informasjon om intervjuet:

- **Definere tidsperspektiv:** *Dette intervjuet vil ta ca 30-45 minutter.*
- **Opptak:** *Jeg ønsker å ta opp intervjuet slik at jeg kan gå tilbake og høre på det som er blitt sagt, samtidig som at jeg kan følge bedre med under intervjuet og ikke være opptatt med å ta notater.*
- **Anonymitet:** *Opptaket vil kun være tilgjengelig for meg, og det vil bli helt anonymisert. Opptaket slettes når masteroppgaven er levert i løpet av juni 2020.*
- **Spørsmålene:** *Vi begynner med en form for introduksjonsspørsmål for å bli litt bedre kjent og slik at jeg kan få en liten innsikt i din bakgrunn som engelsklærer. Deretter går vi over til spørsmål mer rettet mot selve temaet. Ønsket mitt er at det skal fungere som en hyggelig samtale, så du må gjerne stille spørsmål tilbake.*
- **Svarene:** *Tenk gjerne høyt og svar så godt du kan. Det finnes ingen feile svar, jeg er interessert i å høre dine tanker rundt temaet uansett om det er negativt eller positivt ladet. Jeg sitter ikke på noen fasit. Du kan også velge å ikke svare, og står fritt til å avbryte når som helst.*

Er det noe du lurer på før vi setter i gang?

Påminnelse til meg selv: Lytt, gi feedback, følg opp spørsmål, tillat stillhet, ikke avbryt.

Introduksjonsspørsmål - bli kjent med kandidatene og deres digitale bakgrunn

Hvordan kan digitale læremidler potensielt brukes til å understøtte klasseromsdialogen/ muntlig kommunikasjon i engelskundervisningen.

1. Hvor lenge har du jobbet som lærer?
2. Hvilken aldersgruppe har du jobbet mest med i engelskundervisningen?
3. Opplever du at undervisningsformen har forandret seg fra da du begynte å jobbe som lærer?
4. Hva er ditt forhold til bruk av digital teknologi i engelskundervisningen?
5. Hvilke digitale ressurser har de klassene du underviser tilgjengelig?

Hovedspørsmål

1. Muntlige ferdigheter er en av de fem grunnleggende ferdighetene i kunnskapsløftet. Hvordan prioriterer du muntlig produksjon og muntlig interaksjon i engelskundervisningen din?
2. Hvor stor individuell frihet har du til å planlegge egen undervisning, stilles det krav fra administrasjonen om hva undervisningen din må inneholde, i tillegg til læreplanens krav?
3. Jeg har noen spørsmål rettet mot begrepet mot klasseromsdialog?
    a. Hvordan får du vanligvis elevene i tale og hvordan settes en samtale i gang?
    b. Hvem fører vanligvis samtalen og mellom hvilke aktører foregår den?
4. Hvordan ser du på sammenhengen mellom digital teknologi og dialog?
5. Hvorfor velger du å bruke/ikke bruke digital teknologi i engelskundervisningen?
    a. Hvilke programmer/verktøy benytter du mest?
    b. Hva opplever du som utfordrende ved bruk digital teknologi rettet mot muntlig aktivitet?
    c. Hvilke muligheter og potensiale ser du ved bruk av digital teknologi i engelsk undervisningen, da spesielt knyttet opp mot muntlig samhandling

d. Merker du en annerledes respons fra elevene når du/dere tar i bruk digital teknologi i undervisning. Hvis ja, på hvilken måte?

6. Har du fått tilbudt opplæring i bruk av digitale verktøy og programmer, eller er det opp til deg selv å lære deg å bruke dem?

Spørsmål rettet mot observasjonen i klasserommet

Jeg ønsker å stille deg noen spørsmål direkte rettet mot undervisningen jeg har observert i klasserommet ditt. Først og fremst vil jeg si at det var spennende og en positiv opplevelse å observere en lærer med en bredere praktisk bakgrunn enn det jeg foreløpig har.

Lærer 1:

1. Du benyttet (på mandag) en interaktiv gloseaktivitet på den digitale tavlen. Hva ønsket du å oppnå med dette valget?
   a. Kan du forestille deg en måte å inkludere dialog i større grad i denne aktiviteten?
2. Jeg registrerte en iver blant elevene da den digitale tavlen ble tatt i bruk til interaktive oppgaver (eks plassere amerikanske kjennemerker på kartet, glosene og de amerikanske statene) Merker du en forskjell i elevenes entusiasme ved denne form for undervisning?
3. Alderen på elevene og ressursene tilgjengelig setter noen av rammene for hvilke undervisningsmuligheter som finnes. Hvilke digitale ressurser er tilgjengelig for din klasse?
4. Som observatør har jeg lagt merke til en utstrakt bruk av lærerstyrt undervisning. Dette betegnes gjerne som IRE metoden (Initial- response- Evaluation). Hvilke refleksjoner gjør du deg rundt dette valget?

Lærer 2:

1. Hva er din erfaring rundt bruken av programmet Learn Lab?
2. Jeg har registrert at du ofte benytter korte videoer på YouTube i undervisningen. Hva er hensikten bak dette valget?
   a. Ser du muligheter for å fremme dialog ved bruk av slike videoer?
3. I den aller første timen jeg observerte ble elevene bedt om å lage en meny med bilder av fire retter for deretter å presentere disse en og en for klassen. Hva ønsket du å oppnå med denne oppgaven?

    a. Jeg registrerte i samme oppgave at tilnærmet alle elevene presenterte arbeidet sitt for klassen, så det kan tyde på at de ikke er redde for å presentere i plenum. Ser du muligheter for at denne tilsynelatende tryggheten kan benyttes til utvidede muntlige aktiviteter?
4. Som observatør har jeg lagt merke til en utstrakt bruk av lærerstyrt undervisning. Dette betegnes gjerne som IRE metoden (Initial- response- Evaluation). Hvilke refleksjoner gjør du deg rundt dette valget?

Lærer 3:

1. I den første timen jeg observerte startet du timen med å vise utvalgte tegneseriebilder som illustrerte Brexit og ba elevene diskutere pro/cons om hvert bilde i 3 minutter før de delte tankene sine i plenum. Hva ønsket du å oppnå ved dette valget av undervisningsform?
2. Da vil jeg se litt på den første timen jeg observerte i 1. vgs. Etter elevene hadde gjennomført de fire minuttene med "fast writing" og presentert arbeidet sitt for sidemannen, registrerte jeg at du tilsynelatende konsekvent ba hver enkelt elev om et stikkord hver som kunne bidra til det felles tankekartet på whiteboarden. Hvilke tanker gjør du deg rundt dette valget? Ser du muligheter for hvordan dette kunne vært gjort for å øke dialogen ytterligere?
3. Programmet Quizlet så tilsynelatende ut til å vekke engasjement og konkurranseinstinkt hos flesteparten av elevene, spesielt guttene. Hvilket utbytte/kunnskap tror du elevene får ved hjelp av dette quizprogrammet?
    a. Så vidt jeg har skjønt etter å ha undersøkt nettsiden til Quizlet finnes det andre læringsaktiviteter på siden som kan brukes, som for eksempel flashcards, skriveoppgaver og "lotto", hva passer sammen. Har du noen erfaring med disse? Hvis ja, hvordan bruker du disse i undervisningen din og ser du for deg muligheter for hvordan disse kan bidra til å styrke klasseromsdialogen?
4. Shock Talk og Hot Seat var begge aktiviteter som jeg ikke har hørt om eller sett bli praktisert. Hva ønsker du å oppnå ved valget av disse aktivitetene?
    a. Hvordan bidrar disse til klasseromsdialogen i engelskundervisningen?
5. Som observatør har jeg registrert en tidvis utstrakt bruk av lærerstyrt undervisning utenom aktivitetene nevnt i de foregående spørsmålene. Dette betegnes gjerne som IRE metoden (Initial- response- Evaluation). Hvilke refleksjoner gjør du deg rundt dette valget?

Avslutning

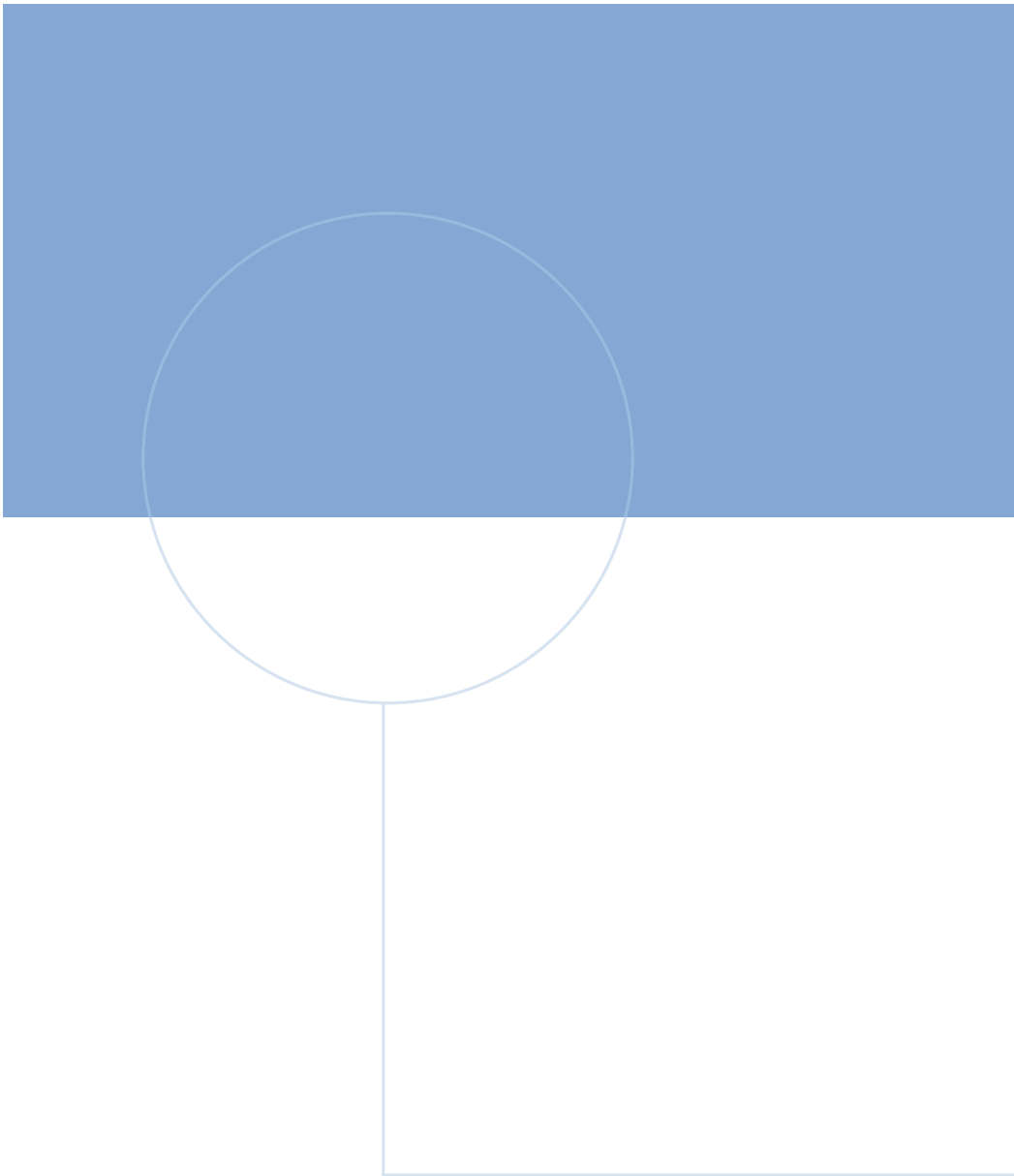
Uttrykke takknemlighet: *Tusen takk for praten og at du tok deg tid til dette. Det har vært veldig lærerikt for meg.*

Videre prosess: *Jeg skal nå høre gjennom lydopptaket av intervjuet og transkribere det. Hvis du ønsker kan jeg sende det til deg slik at du kan lese det og eventuelt komme med oppklaringer hvis du føler deg misforstått. Da kan du kontakte meg på mailen vi allerede har korrespondert gjennom.*

Appendix D – Example of field notes

Dato: 28.01.19 Hvem: Lærer 3 Klasse: 1. vgs

Objektivt hva som skjer	**Tolkning av situasjonen**
Nytt tema introduseres: USA De starter med en oppgave som kalles "Fast Writing". Elevene velger om de vil skrive for hånd eller på PC. Læreren setter på en stor stoppeklokke på smarttavla på fire minutter og elevene skal skrive sammenhengende i disse minuttene. De får i oppgave å skrive det de vet om USA. Det kan være alt mulig. Når minuttene er gått, bes elevene å presentere det de har skrevet til sidemannen. De kan velge om de vil lese direkte det de har skrevet eller fortelle sidemannen. Elevene får også utdelt en post-it lapp hvor de i løpet av timen kan skrive forslag til hvilke underkategorier de er interesserte i å lære mer om i løpet av temaet USA. Tankekart på whiteboard. Alle elevene kommer med et stikkord som de skrev i fast writing. Læreren inkluderer alle og går runden rundt i hele klasserommet og gir enkelte elever en ekstra mulighet til å komme med forslag når alle har deltatt. Læreren følger opp med tilleggsinformasjon eller -spørsmål og er flink til å rose elevene. For eksempel hvis det er en person som er ukjent for henne, spør hun eleven slik at hun og resten kan lære det.  Quizlet app - quizappen deler klassen inn i grupper etter at de alle har registrert seg. Elevene flytter rundt i klasserommet i grupper på 3. Alle trenger hver sin PC eller mobil. Spørsmålet vises på alle skjermene, men svaralternativene fordeles på alle skjermene og elevene må derfor samarbeide for å komme frem til riktig svar. Sumscoren til hvert lag, vises på digitale tavla slik at alle kan følge med hvor godt laget deres ligger an. De gjennomfører flere runder.	En fin måte å la elevene få tenke i fred over hva de faktisk har av forkunnskaper. De jobber individuelt og i stillhet og blir ikke påvirket av andres tanker. Stoppeklokka trekker inn det digitale i oppgaven. Man kunne selvfølgelig også brukt mobilen til det, men på tavla blir den tydelig for alle elevene og det er også blitt en liten konkurranse i seg selv at læreren skal stoppe så presist som mulig på 4 minutter. Hva gjør man ikke for motivasjonen og gleden? Her kommer det muntlige inn og elevene må alle snakke på engelsk. Så vidt jeg hørte snakket ingen på norsk heller. To og to sammen senkes også terskelen veldig, da klassen er opptatt med å høre på sin egen partner. Fin repetisjon av det de nettopp har skrevet. Post-it lapp ideen var kjempefin og tror det vekker ekstra motivasjon hos mange elever å få lære om noe de faktisk selv er interessert i, samtidig som de blir hørt av læreren. Tankekart ble laget på whiteboarden, så det digitale blir ikke akkurat trukket inn her, men det er samtidig like så enkelt å gjøre det på tavla. Selv om denne ikke kunne deles med elevene etterpå slik en kan når man gjør det digitalt. Elevene sier ikke mye hver, men her tror jeg lærerens fokus var å få alle til å si litt enn noen få til å snakke mye. Denne dialogen er lærerstyrt og krever lite fra elevene mtp på kun et stikkord hver, men den inkluderer alle og læreren følger opp enkeltelevers svar med oppfølgingsspørsmål. Kanskje er dette elever hun vet er trygge på å uttrykke seg i klasserommet? Denne appen var gøy, og det er tydelig at den fanget elevene også. Det var et stort konkurranseinstinkt. Spesielt blant guttene. Appen fordrer både dialog, samarbeid og fagrelatert kunnskap. De kunne med fordel snakket mer sammen for å finne riktige svar, men med PC skjermene vendt samme vei kunne de se på hverandres skjerm fremfor å snakke sammen. Man kan sikkert også tilpasse spørsmålene til ikke bare å være korte faktasetning-spørsmål.



NTNU

Kunnskap for en bedre verden