UNIVERSITY OF JYVÄSKYLÄ

CORRECTIONS OF NON-NATIVE STUDENT ERRORS

IN AN EFL CLASSROOM

A Pro Gradu Thesis in English

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1 INTRODUCTION

The focus of the present study is on classroom interaction between the students and the teacher. It deals with error correction in a foreign language classroom. It tries to describe the corrections made by either the teacher or the students while exercises are being checked. I chose to look into errors occurring while the students and the teacher go through exercises as there are plenty of situations for errors to occur and also there is a lot of interaction between the teacher and the students in the process of checking different kinds of exercises.

The present study shows how the students correct their own errors. A student might change a word to another in the sentence s/he is giving, after noticing that the first word was not the right one. However, it is quite common that students are afraid to correct their own errors and they show this by hesitating to correct. What is even rarer is that the students ask for correction from the teacher. In other words they do not initiate the correction by, for instance asking for a word they are not familiar with.

Sometimes the teacher might indicate the error and initiate the error correction process without actually correcting the error. In these cases the student who has made the error gets a chance to correct the error him-/herself. From the point of view of learning from errors, corrections by students are the most effective ones as the students get to actively think of the language and how it functions. The study also pays attention to how the teacher corrects the errors. It is very common in classrooms that the teacher corrects an error without even giving an opportunity to the student to correct the error. However, the teacher might give clues about the right answer, for instance by telling about the grammatical form of a word and so trying to get an answer. It is not guaranteed that anyone will answer and so the correction ends up to be done by the teacher. In the case of teacher-correction the study talks about other-correction whereas self-correction is referred to when the students correct themselves. Jefferson, Sacks and Schegloff (1977) suggested that self-correction is preferred in natural conversations outside the classroom whereas in foreign language

classrooms the preference might be the contrary. This means that it is the teacher who usually corrects students.

The aim of the present thesis is to study who makes the initiation of correction in the classroom and who completes the actual correction. I also describe how the correction is done, which techniques are used to initiate the correction and which are used in the correction. I divide the examples I have collected from my data into seven different categories according to who initiates the correction and who completes it. I will discuss this more in chapter four.

As a future FL teacher it intrigues me to know what goes on in a classroom between the teacher and the students. I use conversation analysis as a tool to analyze correction in the classroom between the teacher and the students. The data consists of two double English lessons of high school level. The students are non-native speakers of English.

In my opinion it is important for teachers to be aware of how they behave and react in error correction situations, what kinds of methods they use and what the effect of their actions is on the students. By recognizing the complex error correction patterns it is easier to appeal to the students' motivation for learning and to their self-confidence. Teachers have more tools to encourage their students in studying when realizing the principle aspects of error correction. It is useful to think of one's own teaching methods in order to develop and become a better teacher. With this study I intend to give information on how the error correction is dealt with in foreign language classrooms. I hope this will be an indicative study for those teachers who care for their teaching and want to know what kind of error correction patterns there are. Through multiple examples this study gives options and different courses of action for teachers to approach the error correction issue. What seems to be especially important is the fact that students should be the ones who could correct more.

The structure of the study is as follows. I will first drawn attention to classroom interaction in general and discuss conversation analysis as a tool to investigate classroom actions. Next I will introduce the key terms in analysing correction. The

third chapter discusses correction and repair as different terms and how both repair and correction as phenomena have been researched in classrooms. Finally I justify my choice of using correction as the term in the present study. The fourth chapter is about the data. Also I will show the structure of the lessons under analysis in order for it to be easier to understand the contexts in the classroom. After this the analysis follows. I have categorized my examples into seven categories. Before every example I have described the context in the classroom during the example. Following the analysis is discussion where I compare my results to previous studies. There are also some implications for future research. Into the appendices I have added the transcription conventions and some parts of the transcriptions of the two double lessons.

2 CLASSROOM INTERACTION

2.1 An Overview on Classroom Interaction

Classrooms are very interesting places to investigate. A lot of interaction takes place among very different people. The students might be from various cultures and of different ages. There are countless questions to answer about what goes on in a classroom. This study reveals only a fraction of one area of research. Several researchers have studied and will study the classroom phenomena and the colourful life that it hides inside the classroom walls. Tainio (2007:18) explains that the main focus in research on foreign language classrooms is on the way languages are learnt and not so much on the interaction that takes place. Many researchers have studied different learning strategies and styles as well as teaching methods. However, interaction is also an important part of classrooms. Without interaction there would be no learning.

Douglas Macbeth (2004) has done a comparative analysis of repair in natural every day conversations and of correction that occurs in classrooms and shows how the same principles that are found in natural conversations can be seen in a classroom. His data was collected in a local school in San Francisco. The students were 4th graders, mostly immigrants or non-native speakers from many nationalities. The discussion taking place during the lesson was about punctuation.

Macbeth (2004:703) stresses that classroom actions are always more or less formal, institutional and that classrooms are professional places. There is a certain role division between the teacher and the students. This division makes the atmosphere in the classroom formal or informal according to each situation. Sometimes the teacher is the leader and at other times the teacher might only be an assistant if help is needed. The active or less active role of the teacher has an influence on how the atmosphere is organized. Classrooms are institutional in the sense that the school itself is an institute and that there are common rules and ways to behave. The

teachers are the professionals and in the end they have the final word over the students.

Rogoff (1990 as quoted by Macbeth 2004:704) emphasizes that classrooms consist of cultures of knowledge production and competence. The classrooms may consist of several "knowledges". There are many subjects to study. Knowledges in every subject need to be developed. Through teaching and studying this knowledge can be produced and so acknowledged. The students learn and acquire more and more and their competence in each subject grows. The classrooms are full of ideas, information teaching and learning. All these together affect the competence the students have.

Arminen (2005:112-3) explains that classrooms are places where knowledge and expertise is passed on. He discusses five basic patterns that can be found in classrooms, especially in talk. These patterns are lecturing, the pedagogic cycle, repairs, correctional activities and extra curricular activities. For the present study the most important patterns are repair sequences. He emphasizes that all the patterns have survived throughout the decades all over the world, although in different forms. For the classroom pedagogic discourse to be complete all the patterns are needed.

Arminen (2005:113) suggests that **lecturing** is an essential part of classroom talk and instead of it being monologic activity by the teacher he argues that it should always be a two-directional process including both the teacher and the students. The time spent on lecturing depends on for instance the topic, subject or grade. It is obvious that the more the students get to be a part of the lecturing the more they learn. Too often, however, it is the teacher who keeps on speaking and the students passively listen to the teacher. To make the lecturing more effective the teacher should invite the students to participate in the lecturing by, for instance, asking for opinions and making questions.

According to Arminen (2005:114-6) **a pedagogic cycle** means a three-part structure, in which the teacher poses a question (initiation), gets a reply from a student and then evaluates the reply, whether accepting or rejecting it. By asking questions the teacher can check the understanding of the students. In classrooms the teacher has the ability and authority to assess the correctness of the reply. The questions the teacher usually

asks are questions that s/he knows the answer to and can so evaluate the reply. With the help of the pedagogic cycle it is possible for the teacher to measure information reception of the students.

Repair sequences are closely related to the pedagogic cycle as the third turn by the teacher is a natural place for initiation of repair. In the third turn the teacher evaluates the answer and initiates the correction if necessary. One of the focuses in this study concentrates closely on these third turns by the teacher in examples where she initiates correction after getting an answer from the student. This initiation of correction can be directed to the student who made the error or to some other student.

Correctional activities are to maintain the order and receptiveness in the classroom. Using these activities the teacher can form the invisible rules and behaviour in the classroom. It is totally contextually-bound as when these correctional activities need to be used. The atmosphere in the classroom, the relationships the students have with each other and with the teacher and the mutual respect affect how often the teacher needs to use these correctional activities. The teacher can, for instance tell the students to be quiet, ask them to start working on a task given or ask some student to leave the classroom.

Finally, Arminen points out **extra curricular activities** that are activities outside the normal curriculum but still linked to the curriculum and learning. These activities usually differ from the teacher-centered way of learning. As an example he introduces collaborative storytelling. He states: "Extra-curricular activities offer a solution to balance the otherwise one-sided criteria for the relevance of information." (Arminen 2005:133). He means that usually the same kinds of tasks during lessons are carried out time after time. It is sometimes refreshing to do something totally different but still something that has a clear link to the topic being taught. These activities are a good refreshment to motivate the students and make the learning more fun and exciting.

2.2 Conversation Analysis as a Method

Tainio (2007:25-7) writes about conversation analysis as a method. She tells about the ethnomethodological view and specific features of CA (that will be discussed in the following chapters). Conversation analysis has developed from the ethnomethodological view to be a distinct method that has its own specific features. The idea of reciprocity in interaction is a part of the ethnomethodological view. Harold Garfinkel was the one whose idea it was to use reciprocity as a theoretical view point in CA. He used breaching experiments where he deliberately disrupted the routines in conversation to see how people reacted in the new situation (Hutchby and Wooffit 1998:31). Reciprocity includes all the common rules of how to share and follow the operational principles of conversation and how to maintain them (Seedhouse 2004:9 as quoted by Tainio 2007:26). In practice, the participants in conversation assume that all the speakers know "the rules of conversation" and behave according to them. If one participant breaks these rules by saying something unexpected that is not convenient for the situation the reciprocity is then shattered. For instance, if a student greets the teacher and gets no answer the student immediately starts to think of reasons for why the teacher did not answer. This is because a greeting commonly consists of two parts: a greeting by the one and a greeting back by the other.

Kurhila (2000:360) emphasizes that conversation analysis is highly empirical and inductive and the data is always collected from authentic situations. The analysis is based only on the data available. There are four principles behind conversation analysis: 1) the conversation is structurally organized, which indicates the invisible rules behind the conversation, 2) the turns in conversation are based on the context but they also shape the context meaning that people act and behave according to some specific context but also that the context might change to be different because of something that has been said, 3) all the elements in conversation are relevant showing that every little thing might be crucial and very important in the actual analysis and 4) the analysis is made by using authentic data (Heritage 1989, as quoted by Kurhila, 2000:360).

Kurhila (2000:361-4) explains that, for instance repair is a part of the conversation organization and that it is built up by participants using their turns in a specific way. A teacher might ask a question, get an answer and evaluate the answer (as was discussed earlier). An example of the relationship between context and the turn is a question-answer pair. When a question is made an answer is expected. If no answer is given the context will change to be something else because the normal structure of question-answer pair has been broken. The third principle is also connected to repair as the participants are constantly paying attention to what they say or hear. By repairing turns, participants show that they have taken into account all the turns and can discuss the interpretations and check their common understanding. Everything that has been said has some meaning and thus should not be left out. The fourth principle is about the way conversation analysis deals with the data. Transcription includes all the elements of the conversation. For instance, pauses, laughs and coughs are marked. Again, all of the elements have some meaning that can be revealed by analyzing the data closely.

Kurhila (2000:359) indicates that Harvey Sacks can be considered to be the originator of conversation analysis in the 1970s. Sacks assumed that conversation is strictly organized in a specific way. He argued that conversation includes turns that the participants are oriented to. The emphasis in conversation analysis is to describe the invisible conversational rules that lie behind the conversation. Sacks started his work by analyzing telephone conversations but today researchers usually use taped or video material which makes it possible to observe not only the speech but also non-verbal action (Kurhila 2000:365).

Tainio (2007:28-30) states that Harvey Sacks is the one who brought the specific features into CA through his own studies of every day conversations. One of the main ideas is that the data under analysis is natural, that is, it would have happened in the form it is even without the research purpose. Another aspect is that all the conversations should always be recorded so the researcher is able to go back and check any parts of the conversation to make the analysis more detailed. Moreover, as stated earlier, everything that is included in the data is meaningful and should be taken into account without any presumptions. Transcriptions are made out of the conversations. They include detailed information on, for instance overlaps and

pauses. Tainio emphasizes that interaction is always being studied so that every turn interprets the previous turn and gives a context for the next one. In classrooms, however, these turns are considered to be institutional having a clear goal and they are constructed according to, for instance the plan for the lesson.

There are three levels in conversation analysis. Sorjonen (1997:111) explains the main ideas of these levels. Turn taking, where the utterances of different participants are being investigated, explains how participants take their turns and how the turns are constructed, in what ways the turns are given or taken, how they are completed and how a participant can continue the turn. Another level is organization where the participants construct larger units of speaking, for instance, a question and answer pair, called adjacency pair, where the sequence of a question and an answer and their relation to each other is under discussion. In other words, in conversation there are cases when one turn needs another turn for the conversation to be complete. These two levels affect the way how interaction is being carried out and how the conversation goes on. Sorjonen adds that without these two levels there would be no interaction.

The present study deals with repair organization, which is the third level of conversation analysis shaping the conversation. Sorjonen (1997:111) indicates that with the help of repair organization it is possible to understand and explain all the ways that are used by the speakers when problems occur during talking, listening and understanding. In other words, the speakers always try to reach a mutual understanding. Repair is described as a process that usually ends in solving the problem. It has a beginning and an end so that the repair organization has a clear part that can be limited, in the conversation where the repair happens (Sorjonen 1997:112).

Tainio (2007:32-5) discusses the same three levels of conversation analysis mentioned above but in a classroom context and how they take place in different situations along the lesson. According to Tainio, there are always two participants in a classroom: the teacher and the students. Having the turn the students each represent, one at a time, the collective group of the students. It depends on the situations available how the turns are distributed: whether they are taken or given and

how the participants keep the turn. However, it must be taken into account that it is always the teacher who in the long run, decides how the turns are used in the classroom.

According to Tainio (2007:40-4), the second level is then sequential in the sense that it includes the adjacency pair that can be for instance, a question and an answer or a greeting and a counter-greeting. A specific structure in a classroom is the IRE- or IRF- sequence, both of which will be discussed more detailed in chapter 3.4.1, where the teacher makes an initiation, usually a question, the student gives a response and the teacher gives evaluation or feedback according to the response given. Tainio reminds that also the student can be the initiation maker as well.

The third level is a repair sequence. The last part of the three-turn-sequence (E or F) can sometimes be a correction of what has been said. The teacher has many ways to indicate the error. Seedhouse (2004:164-8) mentions that a teacher uses prosodic, non-verbal or verbal ways to indicate or correct the error. Macbeth (2004:716-21) states that the delay of the third turn implies that there is something wrong with the second turn and so the third turn is at least partially rejecting. The way the error is being dealt with is also affected by what has been asked and what kind of an answer is expected. Tainio (2004:48-9) emphasizes that the third turn by the teacher varies according to the situation in the class; whether it is a teaching situation, a conversation or a group work. Cultural differences affect the correction process as well.

Hall (2008:519) states that during the past ten years much interest has been given to using conversation analysis as a tool to examine classroom interaction. Attention is paid especially on repair and correction and how these can be analysed in a classroom. Nevertheless, many of the studies are not focusing on the reasons why correction or repair takes place in the first place but rather on how the trouble is dealt with using correction or repair. According to Hall, the early studies using CA to find out constructional systems in repair are from Kasper (1985) and van Lier (1988). Many years later Seedhouse (2004) conducted studies about repair in classrooms. Hall (2008:519) heavily criticises these studies on their misuse and confusion of the terms 'correction' and 'repair'. Hall (2008:522-3) calls the correction occurring in

classrooms 'constructional correction' which is a three-part sequence called IRF (will be discussed later). From the conversation analytic perspective CA repair or CA correction are, however, interactional resources for teachers or students to deal with troubles because of speaking or hearing.

2.3 Key Terms

2.3.1 Repair Organization

Repair organization is one of the three levels in CA that were discussed earlier. Tainio (2007) pointed out that the third turn of the three-turn-sequence, either E (evaluation) or F (feedback) can be an initiation of a repair turn by the teacher or a student. The first turn is usually a question by the teacher and the second turn is an answer by a student. The repair consists of the initiation by the teacher or a student and is followed by a repair. The repair can be done by the teacher or the student who made the error or some other student.

I will draw attention to the study made by Jefferson, Sacks and Schegloff (1977) as it is the most profound study about repair in general. Even though their study is about repair in conversations, and not in classrooms, I will use some of the same terms they used in their study and refer to and adapt them in classroom situations. There are examples of some of the terms after the explanation to make the description clearer.

2.3.2 Self-repair, Other-repair, the Trouble Source Turn

It is important to know who makes the correction, the teacher or the student. The main argument in Jefferson et al. (1977:362) is that when errors occur in the speaker's turn it is preferred that the error is corrected by the speaker, **self**, rather than someone else, **other**, usually the listener. For instance, a speaker can replace an error, a word, which occurred in his or her turn by what is correct, e.g. by another, correct word right after **the trouble source turn** which is the turn the error occurred in. In all cases the correction sequence consists of the error and the correction.

An example by Jefferson et al. (1977:363) of self-correction and the trouble source turn.

Example 1

Ken:　　　　→ Sure enough ten minutes later the bell r- (trouble source turn)
　　　　　　→ the doorbell rang… (self-correction)

In Ken's turn he self-corrects his own turn. First he starts to say 'bell r-' but stops and self-corrects his turn to be 'the doorbell rang'. So the focus of correction here is the word 'doorbell'.

Example 2

An example by Jefferson et al. (1977:364) of other-correction.
B:　　　　　　→ He had dis uh Mistuh W- whatever k- I can't think of his first
　　　　　　　name, <u>Watts</u> on, the one thet wrote // that piece,
A:　　　　　　→ Dan Watts. (other-correction)

Here person B cannot remember the name of a person he is talking about. Person A in his turn other-corrects B's turn and tells the missing name.

2.3.3 Outcome and Failure

In their study of conversations Jefferson et al. (1977:376) concluded that self-initiation opportunity to correct the error comes before the other-initiation opportunity. In most of the cases self-initiation is taken by the speaker and usually the correction of the error is completed successfully by the speaker. Jefferson et al. (1977:364) conclude that initiation of correction and completion can be quite distinct. Thus, the completion of the correction might sometimes fail. The **outcome** is thus either done succesfully or **failure** occurs. The one who inititates the correction can be different from the one who actually does the correction and initiating the correction is not the same as to correct in all cases.

Example 3

An example by Jefferson et al. (1977:364) of the outcome being a failure.

C: C'n you tell me- (1.0) D'you have any records
            → of whether you- whether you- who you sent-
            → Oh(hh) shit.

Person C tries to self-correct but fails to do that. He cannot say what he is trying to even after several times of trying to self-correct. In the end he gives up of trying to self-correct and thus the outcome of correction is a failure.

2.3.4 Initiator Techniques

Jefferson et al. (1977:367) use the term **initiator technique** to describe how the initiation is started, for example self-initiations begin by *sound stretches*, *hesitations*, *cut-offs* of words or *uh*'s. Other-initiations usually are question words, *who, where* like *Huh? What?*. Also these differ according to who initiates the correction and when. Sorjonen (1997:114) indicates the Finnish equivalents, for instance the hesitation or uncertainty markers, which in Finnish are *öö* or *ää*. Sorjonen points out that within the same turn where the trouble source occurs the initiators used for repair are for instance hesitation markers, pauses or cut-offs.

Example 4

An example by Jefferson et al. (1977:367) of an initiator technique (a question word).

D: Wul did'e ever get married 'r anything?
C: → Hu:h?

In this example C initiates correction by asking a question as he cannot understand what D is asking.

2.3.5 Placements of Initiations or Repair Trajectories

Self- or other-initiations have different **placements** or **repair trajectories** according to which turn is the trouble source turn (Jefferson et al. 1977:365-6). Self-initiated corrections have three main types of placements; first, they can occur in **the transition space**, right after the trouble source turn. Secondly, an initiation placement can also be in **the same turn** where the trouble source occurred. In another study by Schegloff (1997) he looks more closely into the third placement of self-repair: **the third turn repair**. By the third turn repair he means cases such as when the first speaker makes a statement and the second speaker shows that s/he is listening, for instance by nodding or saying 'Mm hmm' and then in the third turn the first speaker adds something to his or her first contribution. Thus the speaker who has made an error in his or her first turn gives no relevance to the second turn, which has been made by the listener, when contributing to correct the error.

In case of the third turn repair Schegloff (1997:35) concluded that there is no connection between the second and the third turn, which is the turn where the correction occurs. That is, if a person takes a turn to say something but fails to say it correctly, then the other person uses his or her turn to reply, for instance with a "continuer" (Mm hm) or with a "forwarding" (Uhm what's that.) without recognizing the previous turn to be problematic. In Schegloff's (1997:32) words: "Some participant produces an utterance in a turn which will turn out to be a trouble source turn --. This turn is followed by a contribution from another participant which neither claims nor embodies 'trouble' with what preceded."

Example 5

An example by Schegloff (1997:32) of third turn repair.
TS B: hhh And he's going to make his own paintings,
NT A: Mm hmm
   B: → And- or I mean his own frames.

Here B makes a statement. A shows that he is listening by saying 'Mm hmm'. A's turn does not affect the next turn by B in any way. A's turn is only an indication of listening and not a turn that might have an effect on how the next turn would be. B in his third turn repairs what he has said earlier. He used the word 'paintings' and in the third turn he repairs the word to be 'frames'.

The fourth trajectory is divided into two: a) the initiation is made by the other **in the next turn** to the trouble source turn where the other might also correct. Other-correction is also one type of repair. B) The initiation is placed as well **in the next turn** but the third turn contains the correction by self. As well as Schegloff, Sorjonen (1997) has studied the placements of initiation. As a result she points out that the speaker who repairs the error uses different means when initiating the repair according to the placement of the repair in the conversation.

3 REPAIR AND CORRECTION

3.1 Repair vs. Correction

I will make a distinction between **repair** and **correction** as they are two separate terms in the studies of this field.

Jefferson et al. (1977:363) determine 'correction' as follows: "The term 'correction' is commonly understood to refer to the replacement of an 'error' or 'mistake' by what is 'correct'.". They also state that the word 'repair' is a more general term and that 'correction' is a subterm of 'repair'.

Alec McHoul (1990:349-50) has looked into correction in Australian high school classrooms in geography lessons. He tries to show how teachers point out an error made by the student but without providing the right correction. Another aspect in his study is to show how the errors are corrected whether by other students or the teacher when there is no correction made by the student in whose turn the error occurred. Like Jefferson, Sacks and Schegloff in their previous studies, McHoul uses the word 'correction' and treats it as a part of repair. He says that correction is a task and result of teaching whereas repair is an achievement of common understanding and that repair is a general term and correction is only a part of it.

Kurhila (2003:43) explains that 'correction' refers to situations when a certain linguistic alternative is provided if the first erroneous term used is not according to the standard language whereas 'repair' is one of the organisations in conversation analysis that can be investigated. She (2003:44) claims that "repair organisation is the interlocutors' resource for achieving intersubjective understanding" when there are problems in hearing, speaking or understanding. Hutchby (2007:57, 59) states that 'correction' means "substantive faults in the contents of what someone has said" for instance slips of the tongue, incorrect word selections, mis-hearings or misunderstandings. Hall (2008:511) defines 'correction' as a part of repair when errors are replaced by what is correct. She also adds that the two terms are used

interchangeably for instance, in the studies of Kasper, Van Lier and Seedhouse when they try to describe the situation where there is a trouble source in the conversation. As in their studies, the present study as well concentrates on describing the correction situations in an EFL classroom. I will discuss the studies by Kasper (1986), Van Lier (1994) and Seedhouse (2004) in more detail in 3.3.1.

I have decided to use correction as the term to refer to when an error occurs in the classroom. Correction describes better my examples from the data as the error is something that must be replaced with something that is correct. Of course there are parts when repair would be more useful to use in the data but I have selected only the events when correction should be used. Moreover, it is usually the case in checking exercises that there is one right answer and if the students give the wrong one the answer is then corrected.

3.2 Repair Types

McHoul (1990:352) introduces different repair trajectories in the form of a table. From the table it can be seen what a turn can be like and what is the content in the turn and how they together affect who the participants are in the repair. This is basically the same as what Hall (2008) introduces below, but in a different form.

Turn	Content	Participant
1 Single turn	Trouble source + initiation + correction	Self

Turn	Content	Participant
2 Single turn	Trouble source	Self
Turn transition	Initiation/correction	Self

Turn	Content	Participant
3 First turn	Trouble source	Self
Next turn	( )	Other
Third turn	Initiation/correction	Self

Turn	Content	Participant
4a First turn	Trouble source	Self
Next turn	Initiation/correction	Other

Turn	Content	Participant
4b First turn	Trouble source	Self
Next turn	Initiation	Other
Third turn	Correction	Self

In this table there are the different turn constructions in repair sequences on the left side. In the middle is the content of the turn(s) mentioned on the left. On the right is the person who speaks the turn.

Joan Kelly Hall (2008:511) has looked into correction and repair using conversation analysis as her tool. Hall (2008:512) introduces the three main components that a conversation is constructed of. The organization of a three turn conversation is as follows: firstly, the first turn of a speaker that includes the message both in meaning and in form, secondly, the next turn that either implies further turns or not and thirdly, the third turn can be a repair for instance due to misunderstanding or mishearing. However, she reminds that repair is not a regular part of conversation but a means to deal with a troubled situation whenever needed. On the other hand Jeffersson et al. (1977:363) emphasize that "In view of the point about repair being initiated with no apparent error, it appears that nothing is, in principle, excludable from the class 'repairable'." meaning that any part of the ongoing conversation can be seen as a trouble source for a participant.

In her study Hall (2008) identifies four repair types with which to analyse her extracts. I will use the same types in my analysis of the extracts. She (2008:513) states that the repair is constructed from two parts: repair initiation and repair outcome. The repair type depends on who initiates and who completes. She uses abbreviations to indicate the type of repair. The first one is **SISR** meaning self-initiated self-repair (see example (4) by Jefferson et al. on p. 10). This type occurs when the speaker in whose turn the trouble occurred initiates the repair and also completes the repair. The repair can occur in the same turn, in the transition place which is right after the trouble source turn before the second turn or then in the third turn. The second type is then **SIOR**, self-initiated other-repair where the speaker who made the error initiates the repair but the other participant completes the repair (see example (13) by Jefferson et al. on p. 11). **OISR** means then other-initiated self-repair where the other participant initiates the repair and the speaker self-repairs in the third turn. The last possible type of repair is **OIOR**, other-initiated other-repair where the whole process of repair starting from initiation and ending in repair is made by the listener.

Example 6

An example by Jefferson et al. (1977:364) of OISR.

Ken:	Is Al here today?
Dan:	Yeah.
	(2.0)
Roger:	→ He is? hh eh heh
Dan:	→ Well he was.

In this example Roger (other) initiates the repair by asking a question about the answer by Dan. The rising intonation in Roger's turn indicates that he is a bit surprised and questions the answer. In Dan's turn he himself repairs his own answer by changing the tense of the verb in the past.

Example 7

An example by Jefferson (1987:87 as quoted by Hall 2008:514) of OIOR.

Larry:	They're going to drive ba:ck on <u>W</u>ednesday.
Norm:	→ Tomorrow.
Larry:	To<u>mo</u>rrow. Righ[t.
Norm:	[M-<u>h</u>m,
Larry:	They're <u>w</u>orking half <u>day</u>.

This example shows hoe other-initiated other-repair can take place. In the first turn Larry says 'on <u>W</u>ednesday'. This is, however wrong and Norm in his turn other-repairs the day being 'tomorrow.' In this case there is no initiation of repair.

3.3 Repair in the Classroom

This chapter deals with studies about repair in classrooms. Kasper, Van Lier and Seedhouse have made studies where they consider the repair organization in different contexts that appear in classroom according to what is being done. I first present the study by Kasper (1986), secondly Van Lier's (1994) and finally Seedhouse's study (2004).

3.3.1 Repair in Different Classroom Contexts

Because the present study concentrates on analysing errors made in situations where exercises are being checked it is worth looking into research of different contexts in a foreign language classroom.

Kasper (1986:15-16) explains that the way repair is used is in relation to what is being learnt and how. Her data is collected from a Danish upper secondary school, from science lessons. The lessons are about oral translations from Danish into English and discussion of a text. She concentrates on both to the students' errors and their repair but also on errors made by the teacher. For the present study I only consider the ones concerning the student-made errors and their repair.

Kasper (1986) divides the repair areas in a foreign language classroom into two phases: *language-centred* and *content-centred* where the focus is on expressing ideas about a certain issue in a foreign language rather than on formal correctness like is the case in the language-centred phase. In a language-centred phase the self-initiated and self-completed repairs by the students are rare and self-initiated and other-completed repairs are not performed at all. Instead of initiating repair the learner might cut off the utterance before the trouble source and ask for help in their native language (Kasper 1986:18.) However, Kasper (1986:25) also writes about self-repair of a grammatical trouble source which would indicate that a learner repairs some point included in the language-centred phase having to do with grammar. The student repairs his or her own speech according to the knowledge of grammatical rules if necessary. Moreover, Kasper (1986:26) states that sometimes "…the learner is uncertain about the lexical meaning, therefore repairing the original selection as a safeguard.".

Kasper (1986:18-20) also discovered that usually the teacher, sometimes the student, is the one who initiates the repair because usually the teacher is the one who pays attention to the forms used by the student. It is quite controversial that Jefferson et al. (1977:370) in their study state that "…when 'errors' of grammar are made and repaired, the repair is usually initiated by speaker of the trouble source, and rarely by others." In Kasper's data the preferred type of repair is other-initiated and self-completed repair where the teacher initiates and the student completes the repair. This might be because, especially in her data of oral translation, there are not many possibilities for a learner to initiate repair as they "have to provide FL responses to very short NL stimuli" (Kasper 1986:17).

Other-initiated and other-completed repair is quite common in classrooms when the teacher initiates and some other student than the one who made the error completes the repair. However, in the case of some other learner completing a repair it is the teacher who confirms the repair completion. This clearly shows that the teacher has the authority in a classroom and so has the final word on what is correct (Kasper 1986:16.) Kasper (1986:22-27) found that in the content-centred phase self-initiated and self-completed repair was essential but even more central was other-initiated and

other-completed repair as it was in the language-centred phase as well. Self-initiated and self-completed repairs were about a linguistic or a content problem.

Van Lier (1994:180-184) firstly states the fact that in a classroom there is a continuous adjustment-in-interaction, as he calls it, between the teacher and the students. It means that as discrepancies occur, it is possible through adjustment, to find a resolution. He emphasizes that the students in the classroom are constantly trying to develop their target language system and this can be seen through their errors. He wants to remind that classroom conversation is much different from every day conversation as the speakers in the classroom are not totally competent in using the language and thus errors are expected. Moreover, the type of conversation, the orientation, is different, as it prepares to overtly correct any errors that might slow down the learning. It should also be remembered that all the students and the teacher are members of the same classroom that has its own rules and assumptions of how to behave in conversational situations.

Van Lier (1994:187) distinguishes three main language function categories following Ellis but making the concept a bit broader. The first language function is **medium-oriented,** and covers forms and functions of the target language. The second one is **message-oriented,** and includes processing ideas, information and thoughts as well as feelings. The last is the **activity-oriented** function where the main focus is on organizing and conducting certain activities.

In classroom situations, as van Lier (1994:191) states, self-repair occurs but still other-repair is particularly frequent. Van Lier (1994:194-202) categorizes all the possibilities of how and when errors, in a classroom, can be repaired as follows: 1) *same-turn self-repair* where hesitations, pauses, word replacement and rephrasing occur. The amount of self-repair depends a lot on the activity or task in a classroom. For instance, with longer utterances required by the students it is usually the teacher who initiates and repairs. 2) *Transition-space self-repair* occurs in the short moment after the turn where it might be assumed that the previous speaker or the next speaker would continue. Jefferson et al. (1977:374) suggest that within this transition place the next speaker might delay his turn in order to give space for the first speaker to repair if there was an error in the turn. However, according to van Lier (1994:196)

there are no occurrences of this kind of behaviour by the teacher. This might be because of two reasons. Firstly, the end of the turn is a more clear cut issue than in every day conversations. Secondly, withholding is rare as other-initiations begin while the trouble source is being under progress.

3) *Third-turn self-repair* according to van Lier's studies does not occur at all. 4) *Other-initiation/self-repair* is divided into two main contexts: a) same-turn initiation/same-turn repair and b) next-turn initiation/third-turn repair. This type of construct is very common in his data especially when there are problems related to hearing or understanding the talk. For instance, if a linguistic form needs repairing the teacher initiates repair by cluing which means that the teacher gives clues about the right answer and so tries to lead to the right answer. 5) *Other-repair* can occur while the trouble source turn is still in process or in next-turn position. Like number 4) also this type is divided into two: a) same-turn other-repair or b) next-turn other-repair. It seems, according to van Lier that this type of repair is classroom-specific as it does not occur in every day conversations. This is very common in his data. This type of trajectory is also called *helping* and it usually focuses on minor issues in long utterances. If other-repair happens in the next turn it is called the third turn and usually contains feedback or evaluation. 6) *Self-initiation/other-repair* is not so common in his data. When it occurs it is usually the teacher whom the request of other-repair is directed to by a student. Van Lier mentions here a rising intonation as a self-initiation technique.

Seedhouse (2004) has studied repair in different **contexts** available in a classroom: *form-and-accuracy*, *meaning-and-fluency* and *task-oriented contexts*. There is a connection between what is being repaired in a certain situation and how the repair is organized (Van Lier 1988, as quoted by Seedhouse 2004:141). The form-and-accuracy context means that the focus is on grammatical points and correctness in speech and writing. The repair in this context is thus related to, for instance specific verb tenses or to the use of articles. The meaning-and-fluency is, if compared to the previous one, quite the contrary, as the focus is on understanding and producing speech fluently. Attention is not paid much to grammatical points. In the task-oriented context the aim is to deal with the task given so that the result is good and that the task is done. The task can either be a group or an individual task.

As an example of form-and-accuracy context a repairable can be for instance a specific linguistic form. The organization of repair, in this case, is, according to Seedhouse (2004:144-146,149), usually initiated by the teacher if the linguistic forms are not produced in a way the teacher expects them to be produced. In addition, there may occur teacher repair even if the student's answer is correct and appropriate. Usually these kinds of situations include additional information that is not relevant for that specific purpose. In his data there was more other-initiated self-repair than of other-initiated other-repair. He also suggests that only in the form-and-accuracy context does the teacher require the precise and accurate form needed. He (2004:147) adds that the teacher might ask for repair from another student if the answer of the first student is not satisfactory enough. This repair is called other-initiated other-repair.

Seedhouse (2004:151,155-7) points out that in meaning-and-fluency context the teacher, as well as the students, initiate the repair by asking for, for example clarification questions when the emphasis is on understanding, not linguistic forms. Unless there is a breakdown in understanding the erroneous linguistic forms are not dealt with. Students as well as the teacher might use the wh-questions as an initiator technique. However, usually the aim is not to initiate repair but rather to ask for clarification. The focus is on common understanding. He (2004:147) also mentions that self-initiated and other-completed repair is quite common in classrooms. As the focus in this context is on understanding the teacher does not initiate repair even if linguistic errors do occur (Seedhouse 2004:150). As the students try to understand each other while speaking they initiate repair also by themselves and repair each other's utterances. However, in these cases as well the repair is only about the accuracy of what is being said rather than about the grammar (Seedhouse 2004:151.)

In task-oriented contexts the repair initiation is done by the learners as they together try to sort out a task given to them. Anything that is in the way of their accomplishment of the task is considered to be an error and needs to be corrected. The teacher is usually the one who corrects the error which the students initiated asking for help using clarification requests, confirmation or comprehension checks. Seedhouse (2004:147) explains that "The learner will initiate other-repair if he or she reaches a point at which he or she is no longer able to proceed or alternatively to

verify that the forms produced are in fact those targeted.". It is interesting that there is no attempt by one student to correct another in this context, whereas in the data in form-and-accuracy context it can be noticed.

Kasper (1986:13) states that as well as the teachers also the students modify their own turns in order to correct them if they think the turn includes some part that could be considered erroneous. However, she introduces different contexts where repair occurs. Kasper in her study (1986:13) argues that even though correction in a classroom in terms of when, how and what is corrected is important, the reasons why the teacher should correct in the first place ought to be discussed more. According to Krashen, the mere correction leads the students to control explicit rules but the actual acquisition of a language is then being discriminated (Krashen 1982 as quoted by Kasper 1986:13). In other words, the fact that correction happens helps the students to control and use, for instance certain grammatical rules in practice but the actual use of language is, at the same time, left with less attention, which would be in Krashen's view more important than knowing the rules.

All in all, the studies discussed above report more or less the same results: the teacher is the one who repairs the error more often than the student, the teacher is also the one who initiates more often, still giving the student space to self-repair. However, one must bear in mind that how the repair event is handled depends on the context in the classroom.

3.3.2 Ways to Initiate

Van Lier (1994:193) reminds that it is quite common that there is no actual initiation and that there might even be an initiation but then again no repair following it. In this case the repair would be unfinished. Furthermore, he calls initiator techniques such as pauses or turn-holding devices *interactive actions* rather than initiations as they quite often occur just before repair.

Seedhouse's (2004) study concentrates on describing how initiation, usually by the teacher, takes place in a foreign language classroom. For instance, a teacher can

repeat, stress or lengthen the word which occurred just before the word which was incorrect (Seedhouse 2004:146). Kasper (1986:19) found the same repair type in her data where the teacher repeated the part just before the trouble source. Jefferson et al. (1977:368) call this *partial repeat of the trouble-source turn*. They also introduce *Y'mean* plus a possible understanding of the previous turn which is a type of other-initiation. According to Jefferson et al. (1977:373-4) there are several ways to initiate. One way to other-initiate is *cluing,* giving the students small clues to get the correct answer. Others are *withholding* or *repair-initiation opportunity,* which mean that the speaker gives time to the other speaker to complete the correction initiated by the first speaker. Finally, *recycling* implies that the correction cycle might expand a lot involving several turns. Seedhouse (2004:151) also indicates that initiation can be made by the students as well, for instance by using the so called *wh-questions*.

3.4 Correction in the Classroom

As researchers use the two terms, 'correction' and 'repair', in different ways, their studies will also be discussed according to their use of the term. Thus this chapter includes studies made about correction in classrooms by various researchers.

The correction process starts when an initiation is made by the teacher or a student. The correction can be done by the speaker him-/herself or some other student or the teacher. Jefferson et al. (1977) state, that correction happens when an error is placed with something that is correct. They also say that correction is a part of repair.

3.4.1 IRE- and IRF-sequences

In 2.2 I discussed the repair organization and how it is constructed. I mentioned IRE- and IRF-sequences. I will explain the IRE- and IRF-sequences and how they are related to the correction process. The two sequences differ from each other in using a different term for the third turn that is usually done by the teacher. Both of the third turns are about either teacher's evaluation or feedback on the student's previous turn.

In his study (2004:703) Douglas Macbeth writes about the **IRE**-sequence (initiation-reply-evaluation) which is connected to questions with known answers by teachers where initiation (that is a question) is made by the teacher followed by the student's answer and then evaluation by the teacher. In this way the teacher has the last word in the discourse and it is possible for the teacher to correct answers during the last, evaluation part if there has been a trouble source in the reply.

Relevant for the present study are his conclusions about the **students' delays** or **turn-transitional durations** (2004:716) before answering the teacher's question. This delay shows that the student is thinking of the answer and that it is forthcoming.

Lee (2006:1205) says that even for totally correct answers teachers often ask students to elaborate or reformulate their answer in the evaluation turn. The following example introduces how the teacher might ask a student to elaborate his answer to be more correct even though there is no actual error.

Example 8

An example by Seedhouse (2004:144) of IRE (shortened version).
1 T: right. the cup is on top of the box. ((T moves cup))
2   now, where is the cup?
3 L: in the box.
4 T: the cup is (.)?

In line three the student gives an answer which however, is not complete enough even though it is correct. The teacher is expecting the student to use a full sentence to give his answer. In line four the teacher initiates correction by indicating with a rising intonation that the student should continue the sentence.

Hall (2007:516) uses the term **IRF**-sequence which differs from the previous sequence only by the last letter, which in this case is 'feedback'. However, it depends always on the teacher whether s/he gives feedback that implies correction. Hall points out: "the teacher decides what counts as responses in need of correction or

remediation and what counts as correct or sufficient responses" (Drew 1981 as quoted by Hall 2008:516).

Jane Sunderland (2001:1) makes an important suggestion about students' initiations in IRF-sequences. She claims that many of the initiations made by the students are successful and that they receive an answer from the teacher. Moreover, there may follow a so called 'follow-up' by the student which would in the usual IRF-sequence be the teacher's feedback-part. The follow-up can also be regarded as a new initiation or simply a signal of understanding the teacher's response. Sunderland (2001:4) found that initiations can provide clues to errors.

3.4.2 IREC-sequence

Alec McHoul (1990) stretches the IRE sequence to **IREC** where the C stands for student or teacher correction in the 4th turn. McHoul (1990:353) says that the teacher withholds other-correction but other-initiation for the correction might come quite fast. This proves that the preference still is self-correction by the student. Further he explains how the teacher may overlap the trouble source answer by producing other-correction initiations.

Example 9

An example by Seedhouse (2004:144) of IREC (shortened version).

1 T: right. the cup is on top of the box. ((T moves cup))

2   now, where is the cup?

3 L: in the box.

4 T: the cup is (.)?

5 L: in the box. (C-turn)

This example includes a self-correction by the student in line five. The teacher has first evaluated the student's first response in line four and also initiated correction.

3.4.3 Q-A-C adjacency triad

McHoul (1990:357-9) introduces the **Q-A-C** adjacency triad where C is the comment, rejection or acceptance of the previous turns. In some cases, according to McHoul, the teacher might use his or her C-turn as a *continuation* of the student's previous turn not directly giving the comment on the correctness. Sometimes the C-turn may act as a correction-initiation turn when the teacher redirects the question to some other student without giving any comment before that to the previous turn. So, in a way the teacher corrects the error by giving no comment and initiates the correction by giving the turn to some other potential answerer. However, the teacher might only use a *modulated* other-initiation, meaning that the answer is in some sense incorrect and it should be reformulated.

Example 10

An example by Mäkinen (2008) of Q-A-C.

1864	T	.hh an the next ↑one (.)	
1865		puhtaan ja tarkoituksenmukaisen (energialähteen) (0.5) (clean and most convenient source of energy)	
1866		nuclear power in this case	
1867		umm Veera	
1868	S	°the cleanest most convenient (xx)°	
1869	T	yeah that's right	

This example shows one way of how the teacher might accept a student's answer. In line 1869 the teacher accepts the answer of the student by saying 'yeah that's right'.

McHoul (1990:350,353) has found that in classrooms other‑initiation is more common but still yields self-corrections even though self-initiation is preferred in natural conversations. So usually it is the teacher who initiates and then tries to get the student to self-correct. When self-initiated self-correction comes about, the error is not an error in the strictest sense but more of a grammatical shift, replacing phrases, a vocabulary change or a word search. In these cases Jefferson et al. (1977: 363) explain that a word search might be a reason for a self-initiated repair. Jefferson et al. (1977:363) call these types of errors nonerrors meaning that they are not actual

errors but rather efforts to make the answer better. McHoul (1990:350) states: "what interests me most is a particular kind of repair sequence where teachers use the strategy of indicating unacceptable student answers without providing direct corrections as such". This is a very common repair sequence in the data in the present study as well. There are many cases where the teacher uses a way to indicate an error without giving the right answer, instead she tries to get the correct answer from the student.

3.4.4 The Use of the Third Turn

The teacher has many ways to use his/her third turn sometimes to initiate correction or at other times to other-correct a student's answer. In the following paragraphs I introduce ways to use the third turn by different researchers.

McHoul (1990:360-3) suggests that **cluing** and other-initiation go together quite often. The teacher might reformulate her question and alongside give a clue to the students of the right answer. Another type of initiation that McHoul discusses is **withholding**. In other words the other-initiation is delayed and so space to correct is given to the student.

Yo-An Lee (2006) has studied the third turn positions based on data from college in ESL lessons. The students are either immigrants or international students studying in North American universities. Most class activities are to develop conversation and oral skills. Lee has looked into what kind of third turns there are. Thus it is not to say that when the feedback appears it is always about correction. The first way to correct in Lee's study (2006:1211-13) is **parsing**. The teacher splits her/his question into smaller and more understandable bits after learning to know what was difficult in her/his question after hearing the second turn from the students. The second turn gives the teacher valuable information on the students' understanding and knowing and thus gives clues about how to continue in the third turn.

Lee (2006:1215-17) introduces another possible third turn sequence that is **steering the sequences**. The teacher makes additional questions directing the students to find

the right answer. In cases of steering the teacher may accept several answers along the way towards the right answer as s/he poses questions to the students. The focus of the question may vary for instance from a grammatical point to a pronunciation point. By **intimating answers** Lee (2006:1219-20) draws attention to the fact that teachers sometimes tell the students what they want to hear as an answer and at the same time they point out the problematic part. Another very interesting way for the teacher to use the third turn is called **discovering language learners in action** (Lee 2006:1222). By this term Lee means the event when the teacher treats the students as non-native and indicates this in her third turn. For instance, the teacher might give alternatives for one word that is more difficult than the alternatives would be and this way leads the student to understand the meaning. The teacher may know beforehand what kind of words may be confused with each other and thus know what the student really meant when saying a wrong word.

In Hall's (2008:515) research 'correction' is used to describe 'corrective feedback' which occurs in many ways; for instance **explicit corrections** mean that the teacher gives the correct form without giving a chance to the student to correct the error. **Clarification requests** refer to asking more, for instance the teacher might want to hear more about the issue in order to have a clearer and a better answer or then simply the answer is lacking some part, for instance an article. According to Hall **recasts** mean that the teacher repeats the student's turn and uses the right form replacing the error. **Repetitions** are used so that the teacher repeats the student's trouble source with rising intonation giving a clue that there is something wrong with the answer and then expects the student to correct. **Prompting** aims at giving the student a chance to continue with the right form after the teacher repeats the trouble source until the actual error. Finally, **metalinguistic feedback,** which emphasizes giving clues about the right form (usually grammatical ones) but without actually giving the right answer. For instance, which letter is added to the verb after the 3rd person singular. Sorjonen (1997:114) points out that one correction type is addition of new information. In my data there were several cases when the teacher or some other student added more information to the answer. However, these cases I have analyzed as non-correction as the addition has not replaced any error, it has only been additional.

There are many ways to use the third turn. The use of a certain third turn depends on the situation in the classroom and the type of error the student has made. Choosing the third turn varies a lot according to the teacher. Some teachers may use only couple of the third turns mentioned and some may vary more in using them. It cannot be said which type is the best one. As stated, it is dependent on the focus and the aim of the correction.

4 DATA

4.1 Data of the Present Study

My research data consists of two double English lessons of high school level. All the students are non-native Finnish speakers of English. The data was collected in 2003 by Tarja Nikula from the Jyväskylä University Language Department. The two lessons have been videotaped with two cameras so that one camera tapes the teacher and simultaneously the other tapes the students. In this way it is possible to see both the teacher's and the students' doings at the same time. I have the ready-made transcriptions of the lessons. I have gone through the transcriptions and made some corrections to them as any errors have come across.

The transcriptions include both verbal and some non-verbal elements. With verbal, for instance, pauses and laughs are marked. With non-verbal the movements of both the hands and the head and the direction of the gaze are marked at times. The transcriptions symbols are provided at the end of this thesis in the appendix 7.1. From the transcriptions I have collected 36 extracts to be analyzed. In the actual analysis part of this study the extracts will be provided and discussed more precisely. I will categorize the extracts according to Hall's categorizations of different repair types: SISR, SIOR, OISR and OIOR. Nevertheless, one should bear in mind that the present study focuses on **correction** rather than repair. As well, I will refer to McHoul's IREC-sequence as it includes the fourth turn which very often can be seen in classrooms.

The two lessons are usual EFL lessons in high school. In other words, all sorts of modes of teaching and learning occur during the lessons. In this way my data gives quite a good picture of how error correction is dealt with during the lessons. The group and the teacher in both of the lessons is the same. I have only analyzed errors that take place during exercise checking with the whole class between the teacher and the students to narrow down my topic. I have left out some extracts from the actual four categories that on the one hand seem to be corrections but on the other

hand are not. Nevertheless, I wanted to include these extracts in the analysis because it seems to be very common in classrooms to have these kinds of constructions. Thus I could not ignore theses extracts in my analysis. I have placed these extracts under other categories that are introduced below. In many of these the context affects a lot of how each extract should be interpreted.

The first category includes cases where the student's answer is fully correct and the teacher, after accepting the answer gives further information about the same issue. This could be seen as correcting the answer by giving additional information that should be included in the answer as well but it could also simply mean that the teacher wants to relate some information to the answer. This information is not in all cases central and the teacher did not even expect to hear that information in the answer and so the answer expected was correct. I call this category "Adding Information".

Secondly, some of these extracts are those where the teacher says the right answer given by the student in other words after accepting the answer by the student. Sometimes, in the data the teacher does add some information that clearly corrects the answer and that I have analyzed as well. Nevertheless, more often it is the case of only using other words, not better, to express the same idea only in other words. This category is referred to as "Reformulated Answers".

Thirdly, there were cases when another student used his/her turn to add information to the first student's answer that could not have been meant as correction. However, these cases also included times when the teacher asked another student to correct the first answer or to add some information that is relevant for the correctness of the answer. This category is called "Additions by Other Students".

4.2 The Contents of the Lessons

Table 1 includes descriptions of the two double lessons. It shows approximately what is being done during the lessons. All in all the main point during the lessons is to deal with a text book chapter the class is learning about. The chapter deals with future

threats in technology and also some university students' opinions on the matters discussed in the chapter. Most of the exercises during the lessons are somehow related to the topics in the chapter.

Table 1. The contents of the two double lessons

English 290103	English 310103
Going through idiomatic expressions	Giving back summaries, going through the grading
Checking homework	Reading each other's summaries
Going through the most common tools	Listening to a song
Discussing the topics in the coming chapter	Listening to the chapter again on future threats
Listening to the chapter about future threats	Going through an exercise on word formation
Reading the chapter aloud	Going through an exercise on prepositions
Translating the chapter with a pair	Translating sentences into English
Finding the arguments and making a mind map	A pair exercise on chapter words and arguments
Going through the main arguments together	General announcements, talking about the exam
Translating phrases into Finnish	Listening to a text on computer related problems
Translating phrases into English	Going through the main points written down
Giving home work	Finishing the lesson

Table 2 below includes the number of extracts in a certain category and their percentages. I will compare these numbers at the end of this study. The categories in the table are the same as in the analysis. With the help of the percentages it is easier to compare the number of the different categories.

Table 2. The distribution of the extracts

The Repair Category	The Number of Extracts	The percentages %
SISR	9	25 %
SIOR	1	2.8 %
OISR	2	5.6 %
OIOR	13	36.1 %
Adding Information	4	11.1 %
Reformulated Answers	6	16.7 %
Additions by Other Students	1	2.8 %

5 CORRECTIONS OF STUDENT-MADE ERRORS

In the analysis I have seven different categories. First I will discuss the four main categories that are SISR (self-initiated self-repair), SIOR (self-initiated other-repair), OISR (other-initiated self-repair) and OIOR (other-initiated other-repair). In the end of each category there is a short summary of the main findings of that repair type. Before every extract I briefly introduce the context in the lesson in which the extract takes place so that it is easier to understand the actual analysis that comes after the extract. The three last categories, that are Adding Information, Reformulated Answers and Additions by Other Students, are those that include the extracts that can either be interpreted as correction or only as addition of information or repeating of an answer.

In the analysis the teacher is marked with T, the student in question with S and some student(s) who is/are not relevant in the correction event at that moment with Sx. In many cases there is so much talk that the speaker cannot be identified. These cases are also marked with Sx. Initiation of correction is marked with a small circle (●) and the correction is indicated with an arrow (→). However not all of the extracts include any initiation of correction.

5.1 SISR (self-initiated self-repair)

In the first category I discuss the examples that include self-initiated self-repair. The speaker self-initiates the correction and also corrects it. During the lessons there were nine cases when this type of repair happened.

In extract 1 the class is translating English phrases into Finnish. The phrases translated are all from the chapter about technology and inventions they are going through.

Extract 1

1647	T	our own planetary phenome↑na	
1648		(1.4)	
1649	T	aa (0.2)	

1650		Pauliina	
1651	S ● →	ööö meidän (0.3) oma- omat (0.9) (aaa our ow- own)	
1652		planeetaariset ilmiöt (planetary phenomena)	
1653	T	joo kyllä (yes)	

In line 1647 T initiates the question requesting a translation from S. T selects Pauliina to answer in lines 1649-50. In lines 1651-2 S answers the question. Here S simply uses a restart as an error correction technique. In line 1651 Pauliina first hesitates a bit by saying *ööö* 'aaa' but then gives the answer. However, there follows a restart of a word *omat* 'our own'. This is the correction by S where she changes the word from singular to plural. It seems that S was going to say some other word or that she was going to have some other ending for the word *oma-* 'our ow-'. If we think of the IREC-sequence, here the correction comes before the evaluation that is in line 1653 where she accepts the answer. In this example the initiation of correction is in line 1651 where S cuts off the word.

In extract 2 the class is translating English phrases into Finnish.

Extract 2

1674	T	.hh no >mitä tarkottaa (what does mean)	
1675		predict more accurately<	
1676		(2.2)	
1677	T	Anne	
1678	S ● →	edu- ee ennustaa tarkemmin (pr- pp predict more accurately)	
1679	T	yeah that's right	

In line 1674-5 T asks a question requesting S to translate. In line 1676 is a pause that indicates the T is waiting someone to volunteer to respond. T selects Anne as the next speaker. In this extract S uses a cut-off of a word as an error correction technique. In line 1678 S starts to produce the response by saying *edu-* 'pre-' but fails to produce the word. It is interesting that the next attempt to produce the word is also wrong, that is *ee* 'pree'. S then gives the right answer which is *ennustaa* 'predict'. Again, in this example the correction comes before the evaluation of T that is in line 1679. Similarly to the previous extract (1) the initiation of correction is a cut-off of a word.

In the following extract the class is going through some questions about the chapter just heard. It is obvious that the teacher expects the answers to be formulated into students' own words, as if they would explain the chapter to someone else. Here the main focus is on space exploration.

Extract 3

1437	T	nii katotaa sitte mitä sanottii avaruustutkimuksesta (ok then we could look at what was said about space exploration)	
1438		(1.5)	
1439	T	mitä siinä oli se (what was there)	
1440		tavallaan se perusvastakkainasettelu (0.2) (in a way the basic side arrangement)	
1441		Lassi	
1442	S	<no se että> siihe on tuhlattu (well that it has been wasted)	
1443		hirvee määrä rahaa ja (0.2) (a lot of money and)	
1444		hyödyt o (.) ollu suhteellisen pienet (0.2) (the benefits have been relatively small)	
1445		mutta (0.5) (periaattees) (x) oikei hyödyntämää sitä (but in general not utilize it)	
1446	→	niitä kaikkia ilmiöitä (0.3) (all the phenomena)	
1447		pystytään tutkimaa jotai (something can be explored)	
1448		(1.1)	
1449	S →	avo- asuttamista (muu muassa) (populating among other things)	
1450		(23.0)	

In line 1437-40 T initiates with a question giving a clue in line 1440 about the basic side arrangement and so tells the students what she is waiting to hear. In line 1441 T selects Lassi to answer. She gets a response from Lassi in lines 1442-9. In lines 1445-6 S initiates correction by using his own answer by changing the singular *sitä* 'it' into *niitä* 'those' without any initiation of correction. In line 1449 S uses cut-off of a word *asuttamista* 'populating' because he first pronounces the word in a wrong way (*avo-*) and later then starts to pronounce it again right after comprehending that the first start was wrong. What is interesting is that there is no evaluation by the teacher at all only a long pause follows after the answer.

During extract 4 the teacher is asking questions about the chapter just heard. The answers are given in Finnish. The question in line 1359 is about the quality of life.

Extract 4

1359	T	.hh eli mi↑tä kaikkee sielä sanottiin elämän laadusta (so what was said about the quality of life)	lots of
1360		(1.8)	overlappin
1361	T	mun on parempi istua (0.8) (it is better for me to sit down)	talk in
1362		Anne	the class
1363	S	no se o parantunut teknologian ansiosta (well it has improved because of the technology)	
1364		mut (sitte on) tämmöstä eriarvosuutta kuiten↑ki (but then there is still this inequality)	
1365	T	[joo] (yes)	
1366	S	[että] ihmisillä o jotai (0.2) (that people have some)	
1367	→	eräillä (on niitä) kännyköitä (some have those cell phones)	
1368		ja toiset justii saa puhdasta vet↑täh (0.4) (and others have clean water)	
1369		juomavedeksee (.) (to drink)	
1370		ja sitte (.) väestönkas↑vu (and then the growth of population)	
1371	T	joo (yes)	

In the beginning T initiates by asking a wh-type question. Her question is formulated in a way that she expects to hear all the facts said about the quality of life in the text book. In line 1363 S starts to give her answer. This example includes S's answer divided into several turns. In line 1365 T overlaps with S's turn in line 1366. T wants to indicate that she is listening and that the answer has so far been correct at the same time evaluating the answer. In line 1366-7 S self-initiates and self-corrects her own answer. First she talks about all the people in general *[että] ihmisillä o jotai* '[that] people have something' and then she corrects that some of the people have mobile phones *eräillä (on niitä) kännyköitä* 'some (have those) cell phones'. After this she continues with her answer in lines 1368-70. In line 1371 T again evaluates the answer.

The next extract begins with the teacher's question about water in the chapter just heard.

Extract 5

1555	T	.hh vedestä sanottiin ihan jotain (just something was said about the water)	
1556		siitä ei oikein var- varsinaisesti mitään debattia alettu käymää (it was not actually debated)	

1557		mut se tuli esille siinä loppuvaiheessa (but it came up in the end)	
1558		Pauliina	
1559	S	aa monilla ihmisillä ei ole siis pääsyä (.) (aa many people do not have access)	
1560		puhtaaseen (0.5) (into clean)	
1561	●	siis ei (0.2) (I mean can't)	talk still
1562	→	pysty saamaan puhdasta juomavettä (°esimerkiksi°) (have clean drinking water for instance)	continues
1563	T	joo (yes)	
1564		(15.8) ((there's quiet talk in the classroom))	
1565	T	°yep (0.2)	
1566		eli siinä oli ne pääargumentit siihe (so there were the main arguments to that)	

This extract contains S's self-initiation and self-correction. In line 1559 S starts to respond to the initiation by T and in the same turn initiates correction in line 1561 by replacing what she has said earlier by something new. She starts her initiation by saying *siis ei* 'I mean no' and shows that she is going to replace the previous phrase. The correction happens immediately after the initiation in line 1562. This answer then is correct and T accepts it. The actual error here is not very obvious. S only assumes that changing the words a bit makes the answer better and more Finnish. The actual message about the availability of clean drinking water remains the same even after the correction. Here again, the evaluation by T comes only after the correction by S, simply because T does not assume any error occurred in the first place and thus does not give the evaluation before the correction by S herself.

In the following excerpt the class is going through some translations from Finnish into English. The phrases are from the chapter they have gone through.

Extract 6

1813	T	how do you say	
1814		teknologinen kehitys (technological progress)	
1815		in English	
1816		(4.3)	
1817	T	it's very small (print)	
1818		aa Liina	
1819	S ● →	tec- (0.2) technological progress	
1820	T	°yeah that's right°	

T's initiation is a question of how to translate the phrase into English. Here S initiates correction and also self-corrects in the trouble source turn. In line 1819 S uses cut-off of the word 'technological' and restarts to pronounce it again getting it right. If we think of the IREC-sequence, the evaluation and the correction change places. Usually in the IREC-sequence the evaluation comes before correction. It is often the teacher who evaluates the response and then the correction takes place. Here T evaluates only after S's correction. That is simply because T could not have known why S initiated correction in the first place because there was no hearable error. This example differs from the previous ones, where S has used a cut-off, as there is no change in the corrected form of the word.

The teacher in the following example is again asking for a translation of a sentence into English.

Extract 7

565	T	>seuraavien vuosisatojen aikana (during the next centuries)	
566		kolmannen vuosituhannen **alu**ssa (beginning of the third millenium)	
567		ihmiskunnan elämä kokee (todennäköisesti) suuria muutoksia< (0.4) (the life of human kind will probably undergo great changes)	
568		(x) (lauseita) (sentences)	
569		(1.8)	
570	Sx	((cou[ghs))]	
571	T	[miten] sanositte sen englanniksi (how would you say that in English)	
572		(4.6)	
573	T	(xx) (Lauri)	
574	S ● →	durin' the (0.7) next centuries begin- beginning	
575		be**ginnin**g of the (0.3) third millennium (0.6)	
576		the life of human (0.8) kind (0.2) <will probably> (0.5)	
577		experience °big changes°	
578	T	yeah	
579		>se oli ihan hyvä< (0.6) (that was fine)	

In line 574 S starts to provide a translation for the sentence. He repeats the word 'beginning' three times. S uses cut-off of a word to initiate correction. S completes his correction successfully by restarts in the trouble source turn when he says the word 'beginning' the second time (line 574). He uses the word 'beginning' in a more correct way in line 575. If we compare the phrases 'the next centuries beginning' and

'beginning of the third millennium' it is obvious that the second usage of the word 'beginning' is more correct when used with a different possessive structure. The third 'beginning' is stressed at the end of the word where S had trouble with the pronunciation in the first place and he also realizes the right construction of the phrase and how to use the word 'beginning'. Pauses also indicate that S is doing a word search. During every pause in S's turn he stops to think of the next word. S manages to find and select surprisingly well all the words following the pauses. In lines 578-9 T evaluates the answer to be fine, meaning that there were no bigger problems.

In the excerpt below the class is going through some sentences from the chapter. The task is to translate the sentences into English.

Extract 8

683	T	monien luonnonvarojen tarve lisääntyy (the need for natural resources is going to increase)	
684		(8.9)	
685	T	>haluaako joku< kokeilla (would someone like to have a go)	
686		tarjota vaihtoehtoja (offer options)	
687		(tai) Lassi jotai (or Lassi something)	
688	S	no (0.4) mää en tiiä mikä toi öö lisääntyä ja vaikka (well I don't know what that aa increase and although)	
689		jos sää ne mulle sanot (if you tell me those)	
690		niin voin mää sitten [koke]illa= (then I can try)	
691	T	[no] (well)	
692	T	=increase ja although	
693	S	okei öö (1.1) (ok aa)	
694		the need of (0.2) (*natural*) resources (0.2) °are going to° (0.7)	
695		<in (.) krhm cread> (0.6) although even today (1.1)	
696	● →	<krhm ev- (0.2) ev'ry inhabitant in a-> in the earth (0.4)	
697	● →	haven't (0.7) >hasn' **haven't** got a< possibility to (1.3)	
698		öö clean drinking water	
699	T	↑joo (0.5) (yes)	
700		se oli ihan hy↓vä (that was fine)	

In lines 688-90 S asks T for translations of words *lisääntyä* 'increase' and *vaikka* 'although'. So here S asks T to assist as there are some troubles with linguistic items.

There are hesitation utterances *öö* 'aa' in various lines, for instance in lines 688 and 693. This shows that S is quite uncertain about his answer and that he really needs to search for the words he needs. At this point S clearly shows his lack of knowledge of these two words. In line 692 T gives the right alternatives for the words. In lines 694-8 S provides the translation for the sentence asked. In many parts of his turn he fails to complete his self-initiated correction by giving the wrong outcome. There are quite many pauses (1.0, 0.8, 1.2) as well (lines 693-7). The pauses indicate S's uncertainty of selecting the right words in the turn. S uses cough (lines 695-6) as an indicator of not being certain of the validity of the next word. What is interesting is that both of the coughs are placed just before the word which is going to fail signalling that he has trouble with those words.

In line 696 he succeeds in self-initiated correction with the word 'every' by using a cut-off. Of course, it is possible that he was going to say the right word 'every' right from the beginning when starting with 'ev-'. Another possibility, however, could have been a word 'everything' which would not have been a right choice for this context. In line 697 S shows his knowledge of grammar by using self-correction from 'haven't' to 'hasn't'. In the end, he decides to select 'haven't' to be the right alternative which again shows the failure of self-completing the correction. In other words, he fails to produce the grammatically correct form but does not fail to produce the utterance, in a sense then he successfully does correction but fails in producing the correct answer. In line 696 S succeeds in self-initiated correction. He first says 'in a' then switches the article to 'the' so 'in the'. Self-completion is only partial because S is not able to notice the wrong preposition 'in' which should be 'on'. In lines 699-700 T evaluates the answer to be quite good.

Example 9 has a Finnish sentence translated into English.

Extract 9

723	T	ts .hh >ja sitte ois vie↑lä **pari** (and then there are a couple of more)	
724		viitonen (number five)	
725		eräs pahimpia ongelmia on (one of the worst problems is)	
726		minkälainen vaikutus korkea aktiivisella **ydin**jätteellä< (0.5) (what kind of effect high nuclear waste)	

727		°on ympäristön tulevaisuudessa° (will have on the environment in the future)	
728		(1.7)	
729	T	Osku	
730	S	one of the most (0.2) krhm worst problems is that	
731	● →	what kind of an of- **effec**t does high level nuclear waste has	
732		for environment (°in the future°)	
733	T	joo (yes)	

In line 730 S starts to give an answer to T's question. In line 731 S self-initiates correction by using a cut-off. S starts to say 'of' but stops and restarts and corrects the word to be 'effect'. S emphasizes the word 'effect' showing that it was the word he meant to say. The reason for first saying 'of' is perhaps due to the structure 'kind of'. S might think that the structure is used with two 'ofs'. T in line 733 evaluates the answer by saying 'yes'.

In self-initiated self-correction a certain hesitation element can be quite often seen. This hesitation is usually before starting to give the response or then just before a difficult part that sometimes is the word that is then self-corrected. The hesitation indicates that the students are afraid of errors and on the other hand the students indicate to other students that they are not sure about the answer.

The most favoured initiation technique in this category was the cut-off of the word that is corrected by restarting to pronounce the word. Quite often word replacements were used as corrections. These were used especially when giving answers in Finnish. This is obvious as the students know more words in Finnish than in English. A few students used many turns to hold the floor. In a way they corrected their first turn by adding new information to the previous turn. In these cases pauses between the turns indicated that correction was used as the students had time to think whether the answer needed something more to be satisfying. Pauses were also used as indicators of word search and the initiation techniques.

5.2 SIOR (self-initiated other-repair)

This chapter includes only one extract that is self-initiated and other-repaired. The student self-initiates the correction and the teacher other-corrects it. The reason for only one example is that there were no more examples of SIOR than one in the data.

The class is going through some sayings in English. The teacher is trying to elicit the Finnish versions for the sayings. It is obvious that some of the sayings might not be familiar to the students even in Finnish and moreover, they might not know the actual translation in Finnish either. The teacher is thus expecting an answer that is more or less the right one.

Extract 10

269	T	uhh (0.5) what does it mean if somebody says	overlap
270		let's have one for the road	with LM?
271		(1.5) ((still someone whispering, voice can be heard not words))	
272	T	she said an guess who (picked the wheel)	
273		(4.2) ((still someone whispering))	
274	T	you know this I'm-	
275		I'm sure you've heard it a million times	
276		what does it mean	
277		one for the road	
278		(8.0) ((still whispering))	
279	T	Anne	
280	S	onks se joku varmuuden vuoksi joku (0.2) (is it something like in case of something)	
281	●	tai (0.5) tai (or or)	
282	T	@yeah@ why not (0.3)	
283	→	<or just the last (0.3) drink or last> (0.2)	
284		whatever last (0.3)	
285		whaddo you do **befo**re leaving (0.6)	
286		(°okay°) (0.2)	
287	T	so the last one is	
288		one for the road	

In lines 269-70 T initiates a question. She lays the ground for the coming answer by giving clues in lines 269-77. In line 275 T encourages the students to answer. On several occasions the pauses indicate that T gives an opportunity to answer. In line 279 T selects one S as next speaker. This S is not sure about her answer and that can be seen from the hesitation that is included in her answer in line 280 where she uses words like *joku* 'some'. In line 280 S responds. However, she does not directly give

an answer; instead she asks T whether her answer is right. In the same turn in line 281 S initiates the correction trying to find other alternatives but not succeeding in it. S cannot come up with another answer. In line 282 T evaluates the answer. She does not reject the answer straight away in line 282 but instead accepts the answer but shows that there is a better translation for the saying. In the following lines 283-8 T completes the correction and corrects S's answer by explaining it in more detail and giving additional examples.

This kind of correction happens very rarely in classrooms. In my data only one extract included the student's initiation of correction that was directed to the teacher. This is probably because the students are not used to evaluating their own answers and so not used to deciding whether their answer is correct. Here the student started the initiation of correction without providing a correction. This might be because the teacher's next turn comes quite quickly right after the initiation and so the student did not have the time to self-correct. However, it seems more likely that the student wanted the teacher to correct. When directing the correction to the teacher it seems to be very important for the student to show that s/he knows that the answer is not good enough.

5.3 OISR (other-initiated self-repair)

This chapter deals with other-initiated self-repair where some other than the speaker self other-initiates correction but the speaker self corrects the error. Altogether there are only two examples of this repair type in the data.

Before the following extract the teacher has asked a question about the quality of life and has got a response which, however, was not complete enough and the teacher other-initiates a correction. The previous turn can be seen in the appendix 2 (Transcript 1).

Extract 11

| 1379 | T ● | [miten]
(how) | |
| 1380 | Sx | [(x][xx)
] | |

1381	T	[tämä tämä eri arvosuus tai **missä** se näkyy ehkä] (this inequality can be seen perhaps)	
1382	Sx	(xx)	
1383	T	kaikkein (konkreetimmin) (in the most concrete way)	boys
1384		miks ne kak- (why those tw-)	talk in the
1385		mitkä ne kaks ihmis(ryhmää) on (what are the two groups of people)	backgroun
1386		°tavallaa siihe (0.2) liittyy° (in a way relation to it)	at the
1387		(0.7)	same time
1388	T	uhh Anne	
1389	S →	noissa kehitysmaissa (in those developing countries)	
1390	T	°joo°	
1391		(2.7)	
1392	T →	mää laitan TEOLlistuneet maat ja kehitysmaat (I put here the industrial countries and the developing countries)	

In lines 1379-86 T initiates correction by asking a question. The question is limited as she gives clear clues of what she wants to hear. T wants to know where the inequality can be seen and what the two groups are. T guides the students to find the right answer by making her question more detailed and so indicating what she is expecting for the answer. She uses simple question words. First she asks *miten* 'how' in line 1379, secondly *missä* 'where' in line 1381 emphasizing that question word because it is probably the most important one. Finally in line 1385 she asks *mitkä* 'what' again trying to guide towards the right answer. In line 1388 T selects the same S to respond who has given the first answer. In this case S self-corrects in line 1389 after other-initiation by T. In line 1390 T accepts the answer but she also corrects S in the following turn in line 1392 as S only mentioned the developing countries and T adds the industrial countries to the answer.

In the example below the teacher asks for a translation for a Finnish sentence. It seems that, even if the teacher asks the whole phrase to be translated she still accepts an answer that only contains one part of the whole answer. In the end, however, the teacher self produces the whole answer as was in the previous example where the teacher added some information to the answer.

Extract 12

1875	T	olla vaikutus ympäristöön (have an effect on the environment)	
1876		a very useful phrase (0.4)	
1877	T	uhh	
1878		(1.1)	
1879	T	Anne	
1880	S	no (0.7) (well)	
1881		emmä tiedä (I don't know)	
1882		impact for (0.7)	
1883		emmä £tiedäh (I don't know)	
1884	T	.hh impact means vaikutus	
1885		that's right (0.2)	
1886	T ●	aa but-aa I'm looking for something else this [time]	
1887	S →	[effect]	
1888	T	yeah that's right	
1889	T	.hhh have an effect **on** °the environment°	

This kind of error correction structure is quite rare in a classroom. Right from the start S shows her uncertainty and hesitates to answer (lines 1880-1, 1883). In line 1882 S finally gives an answer which is not the one T is looking for. Apparently S notices it right after giving the answer because she says again that she does not know the answer in line 1883. T notices that S knows that the answer given is wrong and T, to be encouraging, says that her answer means the same thing but this time the context is different and another word is needed (line 1884). T initiates correction in line 1886 with a bit hesitation in her voice that is seen in words like 'aa' and '-aa'. T also says that there is another alternative giving the turn back to S. S self-corrects in line 1887. It is obvious that S knows for certain the right alternative as the answer comes quickly in overlap with T's last word in her turn in line 1886. S hurries her answer to show that she knows the answer and that no-one else gets the chance to answer as the error occurred in her turn. However, the correction is not complete as there is no preposition after the word 'effect'. In line 1889 T completes the correction by adding the preposition. The reason for the rareness of this example is that students seem to correct their own errors quite infrequently. It depends much on the teacher how much time and encouragement s/he gives to the students to self-correct.

In these extracts the teacher was the one who initiated the correction. She made additional questions about the topic to the students to get more information and so get the answer right and adequate. Sometimes she gave clues about the answer. She

also wanted to make clear the difference between the wrong and the right answer. In both extracts the students clearly knew the right answer but were not able to give it at first.

5.4 OIOR (other-initiated other-repair)

The fourth category discusses other-initiated other-repaired examples. In these examples the other is the teacher and the one who corrects is also usually the teacher but sometimes another student. There are 13 examples of this type in the data.

In extract 13 the class is going through some sayings in English. The teacher is trying to elicit the Finnish versions for the sayings. It is obvious that some of the sayings might not be familiar to the students even in Finnish and moreover, they might not know the actual translation in Finnish either. The teacher is thus expecting an answer that is more or less the right one.

Extract 13

233	T	bu the next one might be more familiar to you	
234		what are four le- (0.3) four letter words	
235		>an why shouldn't you use them in your essays< (0.8)	
236	T	what sort of words are four letter words	
237		(2.5)	
238	T	have you ever heard this one	
239		uhh Anne	
240	S	onks se (niitä) lyhenteitä (is it those abbreviations)	
241	T ●	.hhhh not quite ↓no	
242		(2.4)	
243	T	they a:re (0.2)	
244		sort of what sort	
245		shall we say (0.6)	
246		they're ai- (0.2) either bad words	
247		or good words	
248		(1.0)	
249	T	(wha couttei **be**:?)	
250		(0.7)	
251	T	four letter words	
252		(1.5)	
253	T	<now you all> (0.5)	
254		think about the words tha' you shouldn't use	
255		(1.5)	
256	T	Seena	
257	2nd S →	kirosanoja (bad language)	
258	T	yeah that's right (.)	

In this example T gives various clues before she even waits to get an answer. This is perhaps because she already knows what words in the exercise might be difficult for the students and thus she prepares them well and assumes she gets the right answer at once. In lines 234-5 T initiates with a question. In lines 233-6 T encourages the students to at least try to give an answer by informing them about the familiarity of the words. T first reads the question in the exercise and then adds her own question about essays in line 235 giving additional information to ease the question. In line 238 T questions the familiarity after a short pause in line 237 assuming that the student may not, after all, know the word.

In line 240 S responds giving an answer. T evaluates the answer to be wrong and other-initiates the correction by rejecting the answer in line 241, in the next turn to the trouble source turn. T waits for a while waiting to get an answer from other students. As no-one else gives an answer T starts again giving clues. This time she gives two alternatives in lines 246-7 from which the students are to choose the right one. After this, she further tries to elicit an answer three times, in lines 249, 251 and 253-4. There are pauses between the questions giving the students an opportunity to take the floor. In line 253 T asks all of the students to think of the answer. Then a short pause follows in line 255 and T selects another S to answer. So, in the end T initiates the correction of the first S and then the other S corrects the error.

In the following extract the class is translating English phrases into Finnish. The teacher expects the students to translate the phrases, not word by word, but in a topic specific way.

Extract 14

1795		a disaster waiting to happen	
1796		(1.0)	
1797	T	a very good phrase	
1798		(1.1)	
1799	T	aa Lassi	
1800	S	nii onks se niinku (so is it like)	
1801		katastrofi tai (jotai tällaista) (catastrophe or something like that)	
1802	T	kyl[lä] (yes)	

1803	S	[(en] mä tiiä) (I don't know)	
1804		(1.4)	
1805	T →	odottaa tapahtumista suoraa käännetty tai (0.5) (waiting to happen direct translation or)	
1806		**uh**kaamassa oleva (threatening)	
1807		°yeah that's right°	

In line 1795 T initiates a question. Certain hesitation can be noticed in S's response in lines 1800-1. T evaluates the answer in line 1802. Even though T evaluates the answer as correct she corrects it in lines 1805-6. The correction is partly only confirming S's uncertain answer but T's answer also includes the rest of the phrase being translated as S only translated the word 'disaster'. T in line 1805 translates the end of the phrase 'waiting to happen'. T also gives another option for the end in line 1806. In this example there is no initiation of correction. T simply starts to provide the complete translation and so corrects the answer.

This next extract contains a correction by 3rd student in a row of corrections. The 3rd S corrects the 2nd S's answer that has previously corrected the 1st S in his turn. All the corrections are initiated by T. The first two turns by the 1st and the 2nd student can be seen in the appendix 2 (Transcription 2).

Extract 15

1466		(1.8)	
1467	T	Pertti	
1468	3rd S →	°mikä tu[o tutki]mu[s(x)] (o)° ((whispers to LF7 and they discuss quietly)) (what that exploration)	
1469	Sx	[säätä] (the weather)	
1470	T	[joo] (yes)	
1471	Sx	°(xx) (0.5)	
1472		(x) avaruustutkimus sitte° (then the space exploration)	
1473		(1.3)	
1474	Sx	°nii et se o vas[takkai] (xx)° (that it is opposite)	
1475	T	[(ja noi)] (and those)	
1476	Sx	°nii° (yes)	
1477	T	jotain yhteyttä voi olla niillä (0.4) avaruuden ilmiöillä (there might be some connection those space phenomena)	girls talk
1478		meidänki sääilmiöihin	here too

		(to our weather phenomena as well)	
1479	Sx	asuttamine (populating)	
1480	Sx	tutkimus- (exploration)	
1481		(2.1)	
1482	T	tutkimustietoa (pitäs lisätä) (exploration knowledge should be increased)	
1483		>katotaas mitä kaikkee [siel o<] (let's see what things there are)	
1484	Sx	[tietoa] (information)	
1485	Sx	nii just joo (yes yes)	
1486		(3.8)	
1487	T	oliko jotain muuta mitä tähän kohtaan (was there anything else to this point)	
1488		olitte ottanu tai ajatellu että liittys (had you take or thought of that would have some connection to)	
1489		(4.6)	
1490	T	siinä se varmaa se (0.3) <pää> (0.5) (it is probably the main side)	
1491		vastakkainasettelu tuli (arrangement there)	

In line 1467 S, Pertti, gets the chance to answer and other-correction happens. S answers in line 1469 *säätä* 'the weather'. The answer is correct and T in the next turn evaluates the answer by saying simply *joo* 'yes'. In lines 1487-8 T asks the class whether they have anything else to say. One might think that T again initiates correction but in lines 1490-91 she ends up saying that the answers given were enough and at the same time evaluates the answers of the three students. In many parts of this extract there is talk by many students at the same time, for instance in lines 1471, 1479 and 1485 which does not however has anything to do with the correction process that is going on. T also uses several turns to explain the answer in a more detailed way. In line 1475 T starts to explain the answer and continues this in lines 1477-8 and 1482. These additions cannot however be interpreted as corrections because T only says the answer using different words.

Before the next extract the teacher has got a response from a student. The answer has not been completely correct as the teacher is waiting for an answer that contains both of the two countries that are the developing countries and the industrial countries both of which the class has heard about when listening to the chapter. The first turn can be seen in the appendix 2 (Transcription 3).

Extract 16

1389	S	noissa kehitysmaissa (in those developing countries)	
1390	T	°joo° (yes)	
1391		(2.7)	
1392	T→	mää laitan TEOLlistuneet maat ja kehitysmaat (I put here the industrial countries and the developing countries)	

S's response in line 1389 is not complete as it only contains one of the two options that are mentioned in T's turn in line 1392. The expectation of the two countries can be seen earlier in the example 11 (appendix 2, transcription 3) in line 1385. So T other-corrects S's response by providing both two alternatives in line 1392. It is a bit controversial that in line 1390 T evaluates the answer to be correct and still other-corrects it later on without even indicating that an error has occurred. It can be seen in T's correction that she was waiting to get an answer which would have contained both of the countries as she emphasizes the alternative which was not mentioned in S's answer by stressing and saying it a bit louder *TEOLlistuneet maat ja kehitysmaat* 'the INDustrial countries and the developing countries'.

Earlier in the class a student has responded to a question by the teacher in several turns. In the next example the teacher wants to hear more about the energy and other-initiates correction of the previous student. The previous turn can be seen in the appendix 2 (Transcription 4).

Extract 17

1520	T ●	mut sit siinä iha a↑lusa tuotiin joku semmone näkö- (.) (but right there in the beginning some point of view)	
1521		näkökulma esille (was brought)	
1522		(2.3)	
1523	T	ener**giaan** liittyen (0.3) (about the energy)	
1524		puhuttiin ydinvoimasta ja muusta (0.2) (nuclear power was discussed and other)	
1525		[näi yleishuomio] (a general notice)	
1526	Sx	[(xx]x)	

1527	T	senki vois ehkä ottaa tuoho (you could take that there as well)	
1528		°Veerah°	
1529	2nd S	no emmä tiiä (well I don't know)	
1530	→	oliks se sitä et sitä on nii **pal**jo (was it that there was so much of it)	
1531	T	joo kyllä (yes)	
1532		(3.4)	

In line 1520 T initiates correction by asking a question which indicates that there is still something more to the answer. It is interesting that earlier in the example in lines 1517-18 (see appendix 2, transcript 4) T ends the conversation about the topic saying that 'it is probably the basic criticism and arguments about that'. In line 1528 T selects Veera to answer. This 2nd S completes the correction of 1st S's answer of which the correction was initiated by T. Nevertheless, the 2nd S's correction could be seen also as a new turn beginning. Still it seems to be more like a correction because it has a clear connection to the answer given earlier by 1st S. In line 1531 T evaluates this response to be correct.

In extract 18 the class is going through some tools in English by using pictures as help to identify the tools.

Extract 18

708	T	but (0.2) fifteen [there] (in between)	
709	Sx	[aa:]	
710	T	what's that	
711		Sini	
712	S	kisörsh	
713	T	yeah that's right	
714		(1.2)	
715	T →	scis[sors]	

In this example there is only an error to do with the pronunciation, the actual word 'scissors' given by S is correct. In line 712 S responds to the question correctly but fails to pronounce the word in a right way. In line 713 T evaluates the answer to be correct but after a short pause corrects its pronunciation. T takes the S's answer to be too risky to be left without correction for the students and so decides to make sure that they hear the right pronunciation. S might not realize that the pronunciation is incorrect or then again she might know that but does not initiate the correction

because she knows that she was understood. T does the correction in line 715 by providing the correct pronunciation.

In the following extract the class is going through some tools in English. They have pictures as help.

Extract 19

586	T	a::n these things over ↑here (0.4)	
587		what are they called	
588		(1.9)	
589	T	uhh Seena	
590	S	pliers	
591	T ●	.hhh well those are not actually pliers (0.3)	
592		but the pliers are the other ones that look	
593		**almost** like that	
594	Sx	(x[xx)]	
595	T	[so: Liina]	
596	2nd S →	(pinsers)	
597	T	[yeah these are called pinsers]	

T asks a question in lines 586-7. There is a little pause in line 588 as T waits to get a response. In line 590 S answers 'pliers' which is wrong. T initiates correction in the next turn to the trouble source turn in line 591-3 by, on one hand explaining why the answer is not correct and on the other hand, trying to give a clue to the right answer. She admits that mixing the two words is probable and so gives S a feeling that giving the wrong answer should not be taken as a big disappointment. In line 595 T selects another S to answer. This time the answer is correct.

The extract below includes a translation from Finnish into English. The teacher expects to get a full translation for the phrase asked for.

Extract 20

1835	T	tyydyttää (.) tarve (0.2) (sillon) (0.3) (meat the demand then)	
1836	T	umm (0.8)	
1837		Liina	
1838	LF	meet by	
1839	T	yeah °that's right° (0.5)	
1840	→	meet the demand by	

T initiates by asking for a translation. In this case S's response is not complete enough. S simply fails to give the whole answer. In line 1838 S says 'meet by' however it lacks the noun 'the demand' which should have been translated as well. In

line 1839 T first accepts the answer but in the next turn corrects and adds the word
'the demand' in the phrase in line 1840. There is no actual initiation of correction by
T.

In extract 21 the teacher asks for a translation into English.

Extract 21

1864	T	.hh an the next ↑one (.)	
1865		puhtaan ja tarkoituksenmukaisen (energialähteen) (0.5) (clean and most convenient source of energy)	
1866		nuclear power in this case	
1867		umm Veera	
1868	S	°the cleanest most convenient (xx)°	
1869	T	yeah that's right	
1870		(2.3)	
1871	T →	cleanest and most convenient (.) source of energy (0.8)	
1872	T	convenient (0.5) better word for handy	

T initiates the correction by asking for a translation. S responds but does not translate
the phrase thoroughly. The word 'and' seems to be lacking as well as the end in the
phrase in line 1868 is unclear. T in line 1871 corrects the answer by adding the word
'and' and completing the phrase as S does not translate the word *energialähteen*
'source of energy' at all. Of course it might be so that S did translate the end as well,
but it cannot be said for certain as the there has been some unclear speech by S in
line 1868 and thus it has not been possible for T to hear the whole answer. The
unclear speech in the transcription is marked with (xx).

During the extract below a student is to give an answer for a translation.

Extract 22

656	T	Kalle onks sul- joo (Kalle do you have yes)	
657	S	they haven't had many provem- provements yet	
658		to support their statements (but they regarded)	
659		for example solar energy as the cleanest an the most convenient	
660		energy form	
661		(1.1)	
662	T	↑joo-o↓ (0.7) (yes)	
663	T ●	>mut ehkä siinä< todellaki siinä todis↑te: (0.2) kohdassa niin (but perhaps there with the evidence part)	
664	→	.hh (joko) **evi**dence tai sitte **proof** (either evidence or then proof)	

665		(4.7)	
666	T	<ehkä> sielä niinku VÄITTElystä puhutaa (perhaps when it is about debate)	
667		niin siinä on parempi sanoa ehkä e↓vi↑dence (0.2) (then it is better to say evidence)	
668		miksei myös proof (.) tossa vois käydä °siihe° (but also proof there would be ok)	
669		(1.1)	
670	T ●	°ja:° (1.4) (and)	
671	→	consi↑der regarde (1.2)	
672		°(xx) aika lailla (0.2) lähellä (0.9) (pretty close)	
673		sanoa pitää jo**takin**° (consider regard something)	
674		(6.2)	
675	T	°>muuten on ihan< (1.0) <hyvä lause se>°= (otherwise it is ok a good sentence)	

In line 657 S starts to give an answer. In his turn there is self-initiation with the word 'provem-'. S uses a cut-off and restarts to pronounce the word but fails with the outcome. He thinks he got it right the second time and seems pleased with the correction even though there is no word like that in English. In lines 663-8 T initiates correction and gives two alternatives for the word *todiste* 'evidence' and 'proof'. One of the words is 'proof' which supposedly S thought he was using and T apparently noticed, but did not pay any attention to the false word form in her correction. Moreover, T in line 671-3 gives an alternative to the word 'regard' which could be better in this example but also accepts the S's option 'consider' as they are close to each other.

In the previous turns a student has responded to the teacher's question. However, the answer has not been totally right. Thus in the following example the teacher other-corrects some points. This correction can be considered to be the fourth turn in the IREC-sequence. The previous turns can be seen in the appendix 2 (Transcript 5).

Extract 23

701	T ●	>sul oli jotai< (0.3) pientä sieltä ehkä (you had something there perhaps)	
702		>tää o pikkusen erilainen< (this is a bit different)	
703	T →	.hh uhh **NEED** FOR TAI DEMAND FOR (0.3) (or)	
704		iha (0.2) molemmat käy siihen (0.4) (both go there)	
705		tarve johonkin (0.5) uhh (1.7)	

		(the need for)	
706	T	even to**day**	
707		today	
708		mitäs mui↑ta nykyhetkeä viittaavia sanoja vois olla? (what other words could there be for referring to this time)	
709		(1.1)	
710	T →	uhh inhabitants **of** the earth tai **on**: the earth (or)	
711		(1.7)	
712	T	>tai miksei people on the earth< (or why not people on the earth)	
713		(4.8)	
714	T →	don't have	
715		haven't got	

In lines 701-2 T initiates correction by making it clear that the answer was good but that there is still something to correct. In line 703 T gives two options for the word *tarve* 'need' of which the first one was used by S. T also emphasises that both are fine. T tries to think of other words that would go along with 'even today' but she does not come up with anything. Even though her question in line 708 has a rising intonation she is not directing the question to the class to think of. It could be so because there follows a pause (1.1) in line 709. In this case, however she only seems to be thinking aloud to herself. She kind of initiates correction but does not complete it. The 'or' in line 710 can also be a marker of the answer being a bit uncertain. The pause in line 709 is though quite short if T would have wanted to get an answer from the class. In lines 710-15 T corrects S's errors that occurred in his turn. She gives the right preposition with the word 'earth' in line 710 and gives the right form for the verb 'have' in line 714 plus the negative form with two alternatives.

The extract below contains the teacher's fourth turn, the C-turn in the IREC-sequnce. The teacher other-corrects a student's answer after evaluating it to be fine, hence showing it still needs some correction. The student's answer can be found in the appendix 2 (Transcription 6).

Extract 24

734	T →	.h >voit jättää sen **does** sieltä välistä pois (you can leave the does out)	
735		se ois niinku jos se ois suora kysymys (it would be if it was a direct question)	
736		mut tässä tää on niin (0.2) (but here this is)	
737		kysymyslause on upotettu sinne päälauseen sisälle (a question inside a main clause)	

738		nii sen takia että .hh (that is why that)	
739		se- sen voi jättää sieltä kokonaan pois< (you can leave it out altogether)	
740		(1.2)	
741	T	°eli::° (so)	
742		>one of the ↑worst problems< is what >kin' of effect< or impact	
743		>high level nuclear waste< (0.4)	
744	→	will **have** (0.7) °on the environment in the future°	
745		(1.0)	
746	T	tai has (0.3) on the future (0.5) (or)	
747	T	has (0.6) >on the environment in the future<	

In lines 734-9 T other-corrects S's answer. T explains a lot why the word 'does' needs to be left out; because in indirect questions 'does' is not needed. T knows that the sentence was quite difficult to translate and thus wants to explain it thoroughly. Again in line 742 T gives another option for the word 'effect' that was used by S. T also repeats the right corrected version of the phrase in lines 742-4. In line 744 T emphasizes the word '**have**' and so corrects the false form 'has' that S had in his turn. T also gives an option where the word 'has' is being used in lines 746-7 so that the students can see the difference between 'have' and 'has'.

In example 25 the students are to form adverbs from nouns. The teacher waits to get an answer that is fully right.

Extract 25

421	T	.hh an the LAST ONE? (0.2)	
422		accura↑cy	
423		(1.8)	
424	T	a ↑noun↓ but then °an adverb perhaps°	
425		(1.1)	
426	T	mm Anne	
427	S	accurate	
428	T	yeah that's right (0.5)	
429	→	accurat'ly	
430	S	oh	

This example is very interesting as T first accepts the wrong answer and then corrects it herself without even giving a possibility for self-correction by S. What makes it even more surprising is that in line 424 T emphasizes that an adverb is being sought. In line 427 S gives the answer, 'accurate' which is not an adverb. Despite this T in line 428 says 'yeah that's right' and then in her next turn corrects

the answer and stresses the end of the word 'accurate'ly' so that S notices her error. Perhaps T was so sure of the answer being correct even before she heard it, after being said that it is an adverb, that she trusted S to know the word. T therefore accepted the answer right away but only then realizing that the answer was actually wrong. However, it is possible that T heard the answer as being right but still she wants to emphasize the ending '-ly' and thus repeats the word. If that is the case she does not correct the wrong answer but rather repeats the word because it is important to notice the ending. In the last line (430) S notices her own error and is thus surprised to hear the right form and says 'oh'. This as well shows that T thought she heard the answer right and S is then a bit confused because the repeated word is different from the one she said.

In all of these extracts it was the teacher who other-initiated rather than another student. There were more corrections by the teacher without any initiation of correction than there were corrections by the teacher that would have had the initiation of correction. When the teacher asked another student to other-correct an initiation of correction always preceded the correction as, for instance in extracts 17 and 19. Sometimes the lack of initiation can be quite misleading as there were instances where the teacher first accepted the answer and then, without any initiation of correction, other-corrected the answer for instance by adding words that make the answer right. A good example of this is extract 13 where the student in her last turn is surprised by the fact that the teacher did correct her answer even though she had first accepted it. Of course, there are cases when the teacher is not expecting a perfect answer in the first place and thus accepts the answer as right and adequate. There were no other-initiations by other students. Other students probably feel inadequate in terms of English knowledge to initiate correction of some other student.

In some of these extracts the teacher initiated the correction by not directly rejecting the answer but rather accepting it but pointing out that it needs to be modified. Another way to initiate was to first reject the answer and then giving more clues of the right answer. During the actual correction by the teacher she referred to grammatical rules and how to use words in a certain context. It seems to be very important to not merely correct but also explain why the correction has taken place.

Sometimes it depends on the context how well the correction is dealt with and discussed. It seems that if the teacher suspects that the students understood the correction without any explanations provided she will not explain more. However, it must be remembered that these kinds of assumptions need to be taken with caution. In the case of not providing any further explanations it requires the teacher to know the level of knowledge of her students.

5.5 Adding Information

The following category includes some unclear cases when it was difficult to say whether actual correction happened or not. Thus I considered these examples to be more like additions of information than corrections. This category includes four examples.

The teacher in the next extract asks a question about problems related to using the Internet.

Extract 26

1487	T	ts no mitä siitä sa**nottiin** siitä et (what was said about that)	
1488		mitkä <on ne> kaksi syytä jotka johtavat tähän (0.2) ongelmaan (0.9) (what are the two reasons that lead to this problem)	
1489		Anne	
1490	S	välttelee muita ongelmia (avoiding other problems)	
1491		ja sitte yrittää luoda semmose (0.4) (and trying to create a kind of)	
1492		stressi: kipu ja huolivapaan maailman (stress pain free and worryless world)	
1493	T	joo kyllä (yes)	
1494		(4.6)	
1495	T ●	ja sit siinä voi (0.4) (and then you can)	
1496		lisätä vielä sen et (0.2) (add that)	
1497		>niin no joo< (well yes)	
1498	→	paetaa tule- (0.2) todellisuutta (.) (escape the reality)	
1499		kyllä (yes)	
1500		(2.1)	
1501	T	eli paetaan todellisuutta ja halutaan semmosta stressitöntä (.)	

		(so one escapes reality and wants a stressless)	
1502		huoletonta helppoa elämää (life without worries)	
1503	T	.hhh ja vielä voi olla se että lisää itsetuhoa luomalla (0.4) (and you could add that it increases self-destruction by creating)	
1504		<°verkkopersoo↑na (0.5) (a net person)	
1505		erilainen persoonallisuus°> (a different personality)	

In this example T uses addition to make the answer better. T completes S's answer and adds some points to it in lines 1498-1505. However, T in line 1497 notices while starting to add that what she is about to say is the same as what S had said. T says '>niin no joo<'. T only uses other words to express the same idea and in line 1499 then accepts the answer by saying 'kyllä'. In the end in line 1503 T mentions one more thing about self-destruction that could be added about the 'net person'.

Extract 27 contains discussion about energy that has been covered in the chapter just listened.

Extract 27

1492	T	no mitä siitä energian käytöstä (0.6) (well what about the energy use)	
1493	T	mitä siitä keskusteltiin (0.3) (what was discussed)	
1494	T	aa Pertti	
1495	S	(noisko tuo) (0.3) ydinvoima (well would that nuclear power)	
1496		(että oikeutettu ku siinä o vähä saasteita mut) (0.9) (that justified as there is only some pollution but)	
1497		toisaalta ehotettii sitä että (0.4) (but on the other it was suggested that)	
1498		miten ne ydinjätteet vaikuttaa sitte (how the nuclear waste affects then)	
1499		maaperässä sitte myöhemmin (in the soil later on)	
1500		(2.0)	
1501	T	joo (yes)	
1502		(16.0)	
1503	T	tuolla tavalla ja (like that and)	
1504	S →	ja sit siinä on vielä tosta au- (and then there is about the sol-)	
1505		aurinkovoimasta (solar energy)	
1506	T	joo (yes)	
1507	S	että voisko sitä käyttää enemmän? ja (that could it be used more)	

1508		(5.6)	
1509	S	se on täysin saasteetonta mutta [<aika>] (it is fully pollution free but quite)	
1510	T	[joo] (yes)	
1511	S	vaikeeta (difficult)	
1512		eikä kallista ja (0.3) (and not expensive and)	
1513		eikä sitä voi käyttää kaikkialla (it cannot be used everywhere)	
1514		(28.6)	
1515	T	liittykös tähä jotain (0.3) muuta? (is there anything else related to this)	
1516		(5.3)	
1517	T	siinä o varmaa se (0.2) (it is probably the)	
1518		perus (0.5) kritiikit tai argumentit siitä (0.8) (basic criticism and arguments about that)	
1519		<energia> (0.3) muodosta tulevaisuudessa (energy form in the future)	

S uses three turns to reinforce his contribution (lines 1504, 1507 and 1509). The turns following the first turn are completely self-initiated and self-completed. In lines 1492-3 T starts the speech chain by introducing a question about the energy use. She waits to hear some point about it as the question about the issue is very general and does not indicate any specific answer. T selects Pertti to answer in line 1494 and he answers the question. T responds by saying *joo?* 'yes?' in line 1501 with a rising intonation as if she waited to hear more. Afterwards, there follows quite a long pause, 16.0 seconds, in line 1502. During that time the students have time to think further of the issue discussed. The teacher also shows part of the answer on the transparency and in the following turn in line 1503 refers to the transparency by saying *tuolla tavalla ja* 'like that and'. In this case the same student continues his first turn by adding a second turn to his contribution in lines 1504-5. He also begins to talk about a new issue still having some connection to his previous turn and what it contained. T responds again with *joo* 'yes' showing that she is listening.

In his third turn (line 1507) S poses a question, perhaps to the others as well or just for everyone to think of. At the end of the question there is a rising intonation also indicating that he really might wait to get a reply or that someone else would continue his turn. This assumption is supported by the fact that there is a long pause (5.6) after the turn. S actually gives time for the others to answer something. As no-one else takes the turn, he continues himself and gives one reason why it would be

beneficial to use more solar energy. However, he continues with the word *mutta* 'but'. T indicates (line 1510) that she is still listening to him with *[joo]* '[yes]'. The word *mutta* 'but' indicates that S is still holding the floor and he wants to continue. In spite of the interruption, which could be seen as a suggestion to finish the turn, S completes in lines 1511-13 what he was going to say about the negative sides of solar energy. So, in other words S self-initiates correction in line 1504 and completes the correction by adding more information in his answer in later turns. Especially in line 1504 S uses cut-off with the word *au-* 'su-' and corrects it by using restart in the next line.

Again in the following example the class is talking about problems related to the Internet.

Extract 28

1445	T	mistä lisääntyneestä ongelmasta puhutaan (0.9) (what increasing problem is being discussed)	
1446		m Pauliina	
1447	S	öö pakkomielteestä tämmösiin peleihin ja sitte (.) °internettiin° (aa an addiction to these games and then the Internet)	
1448		krhm krhm	
1449	T	joo kyllä (yes)	
1450		(1.7)	
1451	T →	ja jos halus niin (0.2) taikka laittaa internetin **chatistä** (and if you want then or put the chat in the Internet)	
1452		>oli sielä puhe< (.) joo (that was being talked about yes)	
1453		.h >eli nuo kaks asiaa jollaki °tavalla ilmastuna (so those two issues mentioned in some way)	
1454		nii siinä oli° kaks pistet↑tä< (then it is two points)	

In line 1447, right in the beginning of S's answer, there is a bit of hesitation which is shown by *öö* 'aa'. However, S succeeds in giving a good answer. T in line 1451 specifies the answer a bit. The issue was about chat not about games. T very softly corrects the error as she says in line 1451 'and if you want' and does not directly reject the answer being partly wrong. In lines 1453-4 T adds that having the two main points that are the chat and the games, a student gets two points. This addition has nothing to do with the correction. T only states that what one needs to know in order to get two points.

In the following extract the class is discussing the positive sides of the Internet and using the computer.

Extract 29

1455	T	.hh AA <mi↑tä> (0.3) positiivisia puolia media koris- korostaa näissä (what positive sides does the media emphasize in these)	
1456		(0.2) Paavo	
1457	S	se korostaa niinku että (0.8) (it emphasizes so that)	
1458		nää pystyy nää (.) (these can these)	
1459		nörtit pystyy niinku kehittää jotain ominaisuuksia (nerds can develop some skills)	
1460		°(x[x]) (mitää ongelmatapaus)° (no problem situation)	
1461	T	[mm]	
1462	T	kyllä (yes)	
1463	→	.hhh sen lisäksi (0.8) vielä voi lisätä sen että (in addition to that you can add that)	
1464		pelit on **viihdet**tä (games are entertainment)	
1465		(1.8)	
1466	T	mutta että auttaa ihmisiä (0.2) keski- kehittämään °keskittymis ja (but that help people to develop concentration and)	
1467		ongelmanratkaisutaitoja (problem solving skills)	
1468	T	kyllä° (0.5) (yes)	

It seems that it is a bit hard for S to give the answer. He is quite uncertain of how he should give the answer and what words to use. He uses words like *niinku että*, 'so that', *nää* 'these', *niinku* 'so', *jotain* 'some' which all show his uncertainty and hesitation. There is also a short pause (0.8) in line 1457 that indicates S's thinking of the answer. There is no actual initiation of correction but a lot of hesitation. In lines 1463-4 T corrects by adding one aspect of games being entertainment to the answer and as well in lines 1466-7 T gives the two skills that S refers to in his turn in line 1459 by the word *ominaisuuksia* 'skills'.

In the addition-category it is important to remember that it depends on the expectation of the right answer whether the addition is considered as correction. In all of these examples I have analyzed the correction by the teacher or by the student himself to be only addition of information even though it may seem to be correction.

Usually it is the teacher who adds some information to the answer that would make the answer given more correct. So it does not mean that the first answer given is incorrect. In one of these examples it can be seen that also the students may add information to their turns to make the answer more correct. The classroom contexts during the above extracts are mostly about discussing different topics and checking answers that might have more than one correct answer or the answer can be quite long including many aspects of the issue. However, actual corrections may happen in these contexts as well. It depends on the teacher how she treats the answer and what she is expecting to hear.

5.6 Reformulated Answers

There were six cases when the teacher reformulated the answer in her own words and she also added some points to the answer. At some points her answers were a bit better than the ones given by the students. However, these cannot be considered as typical corrections as the answer by the student is correct, only stated in other words.

The next extract contains a student's translation of an English saying into Finnish.

Extract 30

171	T	how about the next one (0.4)	
172		(ä)	
173	Sx	(x[xx)]	
174	T	[this is not good]	
175	T	uhh Mike was always called four eyes at **schoo:l** (0.2)	
176		he was really >blind as a bat<	
177	Sx	(x)	
178	T	I could be called four eyes as well (0.2)	
179	T	so (0.8)	
180		Anne	
181	S	no silmälasit (well glasses)	
182	T	yeah that's [right]	
183	S	[nelisi]lmä (four eyes)	
184		(0.7)	
185	T →	silmälasit (pöllö) (glasses an owl)	
186		or something like that	
187	S	yeah	

In this extract there is no actual error correction. In lines 181 and 183 S gives two optional answers. In line 182 T accepts the first answer by S that is *silmälasit* 'glasses'. In line 183 S gives another option but T does not pay attention to it because the two turns overlap. Thus there is no evaluation of the second option by T. She only repeats the option that is a more correct alternative. In lines 185-6 T gives another alternative to be the answer as well. In line 186 T says 'or something like that' meaning that her correction was only an alternative and that S's answer was very much correct.

In the extract below the teacher asks for a translation for a phrase in English.

Extract 31

1752	T	touch the subject	
1753		(8.2)	
1754	T	umm Osku	
1755	S	(mm) (0.4) koskea (.) aiheita (touch subjects)	
1756	T	joo (0.4) (yes)	
1757	→	koskea tai käsitellä iha (touch or just deal with)	

Osku here tries to translate the phrase in line 1752 into Finnish. In his answer he uses quite a concrete word *koskea* 'touch'. In line 1756 T first accepts S's answer and in line 1757 T repeats S's answer but also gives a more abstract alternative *käsitellä* 'handle'. There follows a short word after *käsitellä* 'handle', *iha* 'just'. By this word T kind of softens her correction showing that the correct answer does not have to be anything special, a common word is enough. It makes me wonder which of the two words is more familiar among the students. I would say that most of the students would select *koskea* as the translation for the word 'touch' in this context even if it is wrong.

The following extract contains a saying in English that should be translated into Finnish.

Extract 32

1759	T	[get a bit side] tracked	
1760	Sx	[(xx)]	

1761	T	[taas hyvä ↑fraasi kun puhutaan] jostain asiasta (again a good phrase when talking about some matter)	
1762	Sx	[(xxx)]	
1763		(3.5)	
1764	T	Anne	
1765	S	joutuu vähä sivuraiteille (get a bit side tracked)	
1766	T	kyllä (0.6) (yes)	
1767	●	.hh (täs o käännetty vähä) yleisemmin suomeks (here it has been translated a bit more generally into Finnish)	
1768		mut sitähän se siis tarkottaa (but that is what it basically means)	
1769	→	joutua sivuraiteille (0.8) (get side tracked)	
1770	→	°poiketa asiasta° (to digress)	

Again in this extract T accepts S's answer but decides to give a better alternative.
This kind of structure seems to be very common in the classroom. So, in line 1765 S
gives the answer and in the next turn T accepts it. In T's turn correction takes place
as T in line 1769 gives the infinitive of the word *joutuu* 'gets' (in line 1765) and
leaves the word *vähä* 'a bit' out from the answer. T's actual correction follows and
she gives the optional answer in line 1770. T softens her correction in line 1767-8 by
saying that S's answer is totally acceptable as it means the same as T's better
alternative. She also adds that the answer looked for is in a more general form in line
1767.

In example 33 the class has phrases to translate into Finnish.

Extract 33

1635	T	ja (0.2) mites seuraavaks sit sanositte suomeksi (and how would you next say in Finnish)	
1636		.hhh as far as the human kind is concerned	
1637		(2.7)	
1638	T	Pertti	
1639	S	<(mitä kun ihmiskunta) (what when the human kind)	
1640		(1.0)	
1641	S	on (0.4) (kaveri) tai kuuluu siihe> (is buddy or belongs to it)	
1642	T	↑joo kyllä (0.9) (yes)	
1643	→	tai mitä mitä ihmiskuntaan tulee (or as far as the human kind is concerned)	
1644		(ihan hyvä) (0.3) <hyvä> käännös siinä (0.4) (yes ok good translation there)	
1645		°pikkusen tarkempi°	

		(a bit more accurate)	

In line 1639 S starts to give the answer. S gives two alternate answers in line 1641. The first alternative is *on* 'is' in line 1641 and the second *kuuluu* 'be a part of' in the same line. In line 1642 T says ↑*joo kyllä* '↑yes fine' and so accepts the answer. Nevertheless, T other-corrects the answer in the same turn in line 1643. She further explains that her correction was only °*pikkusen tarkempi*° 'a bit more detailed'.

The teacher asks for a Finnish translation to the phrase in English in the following example.

Extract 34

1681	T	another (*draught*) will devastate	
1682		(4.7)	
1683	T	sääilmiö (0.3) (a weather phenomenon)	
1684		draught	
1685		(1.4)	
1686	T	mitä (xx) tekee (what does)	
1687		(4.2)	
1688	T	°aa Pauliina°	
1689	S	<joku (0.7) kuivuus> (1.4) (some draught)	
1690		ö (0.2) ai (.) siis kuivuus (0.3) (oh aa so draught)	
1691		tuhoaa että (destroys that)	
1692	T	joo kyllä (0.3) (yes)	
1693	→	tuhoaa (0.6) (soismaa) hävittää (destroys marsh exterminates)	
1694		(2.3)	
1695	T	(°hyvä°) (good)	

S here is quite confused. First of all in line 1689 she is not sure about whether her translation is correct as can be seen from the word choice *joku* 'some'. Then she realizes that she is supposed to continue the translation more. The little words *ö* 'a' and *ai* 'oh' in line 1690 indicate that she is still holding the floor and as well they act as initiator techniques to correct her error of not immediately understanding to continue. So, in other words there is no actual error, only the confusing moment of not realizing to translate the whole phrase. Further T initiates correction in line 1693 and corrects it by adding an alternate word for *tuhoaa* 'destroy'.

The class is trying to make translations for phrases in Finnish.

Extract 35

750		tai miten ratkaista liikakansoituksen ongelma< (or how to solve the problem of overpopulation)	
751	Sx	((coug[hing))]	
752	T	[(joka vain) o**dottaa**] (just waiting)	
753		(1.0)	
754	T	°pahenemistaan° (to become worse)	
755		(10.6)	
756	T	Kalle	
757	S	aa (0.3) how to solve the <problem> of overpopulation (0.3)	
758		the catastrophe (0.3) which (0.2) only waits to get worse	
759	T ●	joo-↑o (0.3) °joo-o° >.h tai sitten (yes yes or then)	
760	→	just waiting to happen<	
761		°on semmonen: mm° fraasi (0.2) (it is a kind of a phrase)	
762	→	tai (0.3) just waiting to become worse (or)	
763		(1.2)	
764	T →	catastro↑phe tai disaster	
765		kyllä (yes)	

Kalle starts his answer in line 757. T initiates correction in the next turn by saying that there are other options as well. In lines 760 and 762 T gives options for the phrase and explains why they could be a bit better than the ones S had. In line 764 T gives another alternative for 'catastrophe'.

By repeated answers I mean cases when the teacher repeats the answer of a student by using other words but not explicitly correcting the answer. In some cases however, it can be seen that the teacher's alternative would be a bit better than the one given by the student. In some examples the teacher might widen the answer a bit by explaining some parts of the answer for instance from the contextual point of view.

5.7 Additions by Other Students

One example in my data showed how another student might add information in order to make the previous answer more correct or better.

In the extract below the teacher asks for more information on the topics discussed in the chapter they have just heard. Previously the first student has given his response, which has not been complete enough. Here the teacher wants to hear more. The first answer is in the appendix 2 (Transcription 7).

Extract 36

1451	T ●	oliko jotain muita hyötyjä (0.7) (were there any other benefits)	
1452		paitsi tää (0.5) (except this)	
1453		<**asutta**miseen> liittyen (0.3) (to do with populating)	
1454		<(oisko teillä jotai) lisä(tarkennusta) tähä> (would you have any additional focusing on this)	
1455		(1.5)	
1456	T	aa Osku	
1457	2nd S →	ni että (0.3) (well that)	
1458		<monilla niillä (.) ihimeillä (.) (many those wonders)	
1459		saattaa olla semmone (.) ratkasu (may have a kind of solution)	
1460		maapallo ongelmiin> (to the problems of earth)	
1461	T	joo (0.8) (yes)	
1462	●	ja (0.2) ehkä enemmänki (niinku) (and perhaps more like)	
1463		MINKÄLAISILLA (0.3) MITÄ (WHAT KIND OF WHAT)	
1464		MINKÄLAISIA ILMIÖITÄ TÄÄLÄ MAAPALLOLLA (SORT OF WONDERS HERE ON EARTH)	
1465		PYSTYTÄÄ (0.8) selvittämään avaruustutkimukse avulla (CAN BE solved through space exploration)	

In line 1451 T starts other-initiation by asking if there are any other benefits mentioned at the same time evaluating the response of the previous student to be inadequate. T adds that she is waiting for additional specifications in line 1454 and at the same time indicates that the answer given was not wrong but instead it needs

something more to be fully correct. T lets Osku to be the one who other-corrects Lassi's (the 1st S) first answer after other-initiation by T. Osku's answer does not satisfy T enough and again T in lines 1462-5 initiates correction of Osku's answer by asking for clarification. This is a good example of how the IREC-sequence may continue by several turns in a classroom where T selects students to correct each other.

I wanted to deal with this example separately from the Adding Information-category even though it is the same kind of addition of information-example. In this example it is another student who uses addition to make the first answer by another student better. The teacher has asked the class whether there is anything else that could be added after getting the first answer. It must be kept in mind that the teacher did not expect the first answer to include all the possible issues that would make the answer correct and thus this addition by another student cannot be considered correction.

6 DISCUSSION

In this chapter I will discuss the results from my data and compare them to the research done earlier. The main idea of this study was to describe the correction event as a whole including the initiation and the actual correction. The examples were divided into four categories according to who initiated the correction and who corrected.

The first category was self-initiated self-repair (SISR) where the results showed that in these cases the student hesitates a lot before self-correcting. This hesitation automatically includes a lot of pauses and cut-offs of words as initiations and the correction is done by restarts of words. Douglas Macbeth (2004) discusses students' delays meaning the pauses that are included in their turns. During these turns according to Macbeth the students think of the right word or alternative. In my data there were altogether nine examples of SISR. In relation to the total amount of examples this number of SISR's is quite big. Kasper (1986) states, that in language-centred phase the self-initiated and self-completed repairs by the students are rare. However, she mentions self-repair of a grammatical source. In my data students in some cases showed their knowledge of grammar by self-repair.

There were nine examples of the SISR-category. Compared to the overall number of extracts, which was 36, the percentage is 25 %. In my opinion this type of repair should be encouraged to be used more in the classrooms as it proves that the students actively think of their answers and want to correct them by themselves. This is a result of learning and acquiring a language in a way that one can critically think of one's own knowledge of that language. The percentage of SISR is quite high. The students should be encouraged to see their own errors and to correct themselves. Teaching of recognizing and correcting errors ought to be a part of learning a language. This type of repair is the most rewarding one when the student's development in knowing a language is concerned.

The second category, self-initiated other-repair (SIOR), proved to be very rare in the classroom as there was only one extract. Reasons for the rareness of this type of category are probably due to the fact that students simply do not feel competent enough to evaluate their own answers and moreover do not want to ask for anyone else to correct their answers. According to Kasper (1986) one reason for this is that it is usually the teacher who pays attention to the forms in the answer. Kasper (1986) as well has concluded almost the same result that self-initiated and other-completed repairs are not performed at all in the language-centred phase. Seedhouse on the other hand (2004) emphasizes that SIOR is quite common in cases when the focus is on understanding. One reason for the rareness of this type of repair in my data might be due to the lack of activities where the focus would have been on understanding. Most of the exercises were about right and wrong answers and not cases when the student did not understand an exercise or an answer for which s/he might have asked clarification for from the teacher.

The SIOR type of repair had only one example, 2.8 %. Also this type of repair should be encouraged among the students. The reason is simple: a student might not know some item of language and still does not ask for correction. The result is that the item might remain unclear and so the student does not learn it. As a future teacher I intend to assure my students to ask if they do not understand something. It is only for their own benefit to ask. Too often students think that asking something shows their lack of knowledge, especially to the other students.

The third category was other-initiated self-repair (OISR), where the initiation of correction was extremely one-sided. McHoul (1990) says that the teacher withholds other-correction but other-initiation for the correction might come quite fast. Van Lier (1994) as well states that there is seldom withholding of initiation because of two reasons: firstly, the end of the turn is more a clear cut issue than in every day conversations and secondly, withholding is rare as other-initiations begin while the trouble source is being under progress. Also in my data the teacher sometimes initiated the correction without any pause between the turn by the student and the turn by herself. Moreover, McHoul explains how the teacher may overlap the trouble source answer by producing other-correction initiations. This can be seen from my data in cases where the student is hesitating the answer and so the teacher initiates

correction. According to Hall (2008) it is very common for the teacher to make clarification requests in order to get a better answer. This type of initiation of correction was used at some points in my data as well as the teacher asked for more specific answers and asked the students to find more to say about one topic. This was especially clear in the cases when the class went through questions about the chapter and the comprehension of it. Hall (2008) introduces metalinguistic feedback that involves the teacher giving clues of the right answer to the students. There were no initiations made by other students. The reason for this, as earlier, is that students do not feel entitled to start correcting other students' answers as they are in the same boat. This category in Kasper's (1986) data was the most preferred type. In my data there were only two examples of this.

OISR included 5.6 % of the extracts. I would have expected a higher percentage of this category. It was always the teacher who initiated the correction. There were not so many examples of this type. In order to have more of these types of corrections the teacher should do more to get the answer form the student himself. Again it would more beneficial for the student to correct the error self. It is understandable, however, that the teacher does not simply have the time to try to get the answer from the student. The time spent on trying to lead the student to the right answer is limited. Sometimes the students might know the answer but they just do not want to answer. Thus, if the students would correct themselves always when the have the ability, the number of SIORs would be higher.

The fourth category (OIOR) dealt with other-initiated other-repair. It turned out to be very common to other-correct without any initiation of correction. Hall (2008) draws attention to recasts that include teachers' correction by replacing the erroneous from with the right one without any initiation of correction. These kinds of examples can be found in my data too. One way with which to other-initiate the teacher used cluing. Another way, close to cluing, was to use additional questions. McHoul (1990) found this way of initiating very common in other-initiations. Lee (2006) on the other hand mentions additional questions as initiation techniques that steer the sequences. Hall (2008) introduces explicit corrections that give no place to self-correction by the students. As in the previous category there were no initiations by other students. A surprising fact was that depending on the level of incorrectness the

teacher corrects herself or asks another student to other-correct. Kasper (1986) states, that this type of repair is very common in classrooms. This proved to be so in my data as well. There were 13 examples of this type. Especially, according to Kasper (1986), in content-centred phase the OIOR is very common. In this study it can be seen as well. There were many cases when the class was going through questions about the chapter when the teacher made adjustments.

The OIOR type of repair was the most common, 36.1 %. A few examples included correction by another student but more often by the teacher. In an ideal case, all the corrections should be done by other students and not the teacher. For the simple reason that: it would be more advantageous for the students. Whenever the students get the chance to deal with correcting, they always learn during the correction process. Comparing SISR and OIOR the difference is rather small. It implies that almost as much do students recognize their own errors and correct them as the teacher does it. Perhaps in the future, as teaching develops, the number could be vice versa.

There were also unclear cases when it was difficult to say whether correction took place or whether it was about adding new information or saying the answer in other words. These categories were referred to as Adding Information, Reformulated Answers or Additions by Other Students. However, Sorjonen (1997) mentions that addition of new information can be considered as correction. Seedhouse (2004) mentions that there might be teacher repair even if the student's answer is correct. Usually it is about including additional information that is not essential for that specific purpose. Kasper (1986) reminds that it can as well be the student who modifies his or her own answer to make it better. In my data there was one example of this.

Sometimes the teacher only reformulated the answer repeating it in a different way. Lee (2006) suggests that even for correct answers teachers often ask students to reformulate their answer in the evaluation turn. However, my data showed this to be quite the other way around as it was usually the teacher herself who reformulated the answers.

The number of addition cases was altogether five, 13.9 %. One example was addition by another student. It depends on the teacher's expectations whether or not these examples are correction. If the teacher expects to get a certain answer and does not get it then the addition would be correction. As well in repeated answers, 16.7 % of all, it was difficult to see what the teacher meant with her repetition of the answer. At some points it almost seemed to be correction but some turn revealed it not to be. Sometimes, even after going through the data and watching the video several times, the analyser cannot be sure of what actually happens during a conversation. Thus, it is safer not to make specific conclusions on matters that are unclear.

The aim of this thesis was only descriptive and the findings do not offer any definitive truths about how errors are corrected. There are so many different students, teachers and classrooms that it would be impossible to make common assumptions on how correction works. Also the number of extracts and lessons analyzed is not big enough to give exact information on how the students and the teacher behave in an error correction situation. However, the two double lessons were quite versatile and they included all kinds of activities. In that sense, the thesis is dependable.

I hope to give the kind of results with which one could go on and do further research about how we could benefit from knowing how errors are corrected in a foreign language classroom. For instance, how does a student benefit from correcting the error himself rather than by the teacher? How does the fact that self-correction happens affect learning outcomes and the effectiveness of learning and acquiring a language? To conclude, error correction is an essential and a big part of every day learning and teaching in all classrooms. Moreover, paying attention to who initiates the correction and who corrects should be emphasized. The more the students get to use the language, in any situation, the more they learn.

7 APPENDICES

Appendix 1: Transcription Conventions

Below are the transcription conventions and their meanings that are used in the transcriptions in the present study.

(0.5)	a time gap in seconds
(.)	a short pause, less than two-tenths of a second
=	the next turn begins right after the previous turn without a pause
?	a rising intonation
(--)	an unclear utterance
,	a continuing intonation
.	a final intonation
ev-	the production of a word is stopped
° °	a word between the marks is said quietly
↑	a word after the mark is said in a loud voice
[ ]	a speech overlap
although	emphasis
a:	the previous sound is lengthened
→	a specific part in the transcript (in the present study *correction*)
●	in the present study *initiation of correction*
CAPITALS	a section of speech noticeably louder than the surrounding speech
> <	a section of speech is produced quicker than the surrounding speech
.hh	the dot before an 'h' indicates speaker in-breath
hh	indicates an out-breath
(( ))	a nonverbal activity
-	a cut-off of a word
!	an animated or emphatic tone
(x)	an unclear segment

Appendix 2: Extracts from the Transcription

Transcript 1

1359	T	.hh eli mi↑tä kaikkee sielä sanottiin elämän laadusta (so what was said about the quality of life)	lots of
1360		(1.8)	overlappin
1361	T	mun on parempi istua (0.8) (it is better for me to sit down)	talk in
1362		Anne	the class
1363	S	no se o parantunut teknologian ansiosta (well it has improved because of the technology)	
1364		mut (sitte on) tämmöstä eriarvosuutta kuiten↑ki (but then there is still this inequality)	
1365	T	[joo] (yes)	
1366	S	[että] ihmisillä o jotai (0.2) (that people have some)	
1367	→	eräillä (on niitä) kännyköitä (some have those cell phones)	
1368		ja toiset justii saa puhdasta vet↑täh (0.4) (and others have clean water)	
1369		juomavedeksee (.) (to drink)	
1370		ja sitte (.) väestönkas↑vu (and then the growth of population)	
1371	T	joo (yes)	

Transcript 2

1437	T	nii katotaa sitte mitä sanottii avaruustutkimuksesta (ok then we could look at what was said about space exploration)	
1438		(1.5)	
1439	T	mitä siinä oli se (what was there)	
1440		tavallaan se perusvastakkainasettelu (0.2) (in a way the basic side arrangement)	
1441		Lassi	
1442	S	<no se että> siihe on tuhlattu (well that it has been wasted)	
1443		hirvee määrä rahaa ja (0.2) (a lot of money and)	
1444		hyödyt o (.) ollu suhteellisen pienet (0.2) (the benefits have been relatively small)	
1445		mutta (0.5) (periaattees) (x) oikei hyödyntämää sitä (but in general not utilize it)	
1446	→	niitä kaikkia ilmiöitä (0.3) (all the phenomena)	
1447		pystytään tutkimaa jotai (something can be explored)	

1448		(1.1)	
1449	S →	avo- asuttamista (muu muassa) (populating among other things)	
1450		(23.0)	

1451	T ●	oliko jotain muita hyötyjä (0.7) (were there any other benefits)	
1452		paitsi tää (0.5) (except this)	
1453		<**asutta**miseen> liittyen (0.3) (to do with populating)	
1454		<(oisko teillä jotai) lisä(tarkennusta) tähä> (would you have any additional focusing on this)	
1455		(1.5)	
1456	T	aa Osku	
1457	2nd S →	ni että (0.3) (well that)	
1458		<monilla niillä (.) ihimeillä (.) (many those wonders)	
1459		saattaa olla semmone (.) ratkasu (may have a kind of solution)	
1460		maapallo ongelmiin> (to the problems of earth)	
1461	T	joo (0.8) (yes)	
1462	●	ja (0.2) ehkä enemmänki (niinku) (and perhaps more like)	
1463		MINKÄLAISILLA (0.3) MITÄ (WHAT KIND OF WHAT)	
1464		MINKÄLAISIA ILMIÖITÄ TÄÄLÄ MAAPALLOLLA (SORT OF WONDERS HERE ON EARTH)	
1465		PYSTYTÄÄ (0.8) selvittämään avaruustutkimukse avulla (CAN BE solved through space exploration)	

Transcript 3

1379	T ●	[miten] (how)	
1380	Sx	[(x][xx)]	
1381	T	[tämä tämä eri arvosuus tai **missä** se näkyy ehkä] (this inequality can be seen perhaps)	
1382	Sx	(xx)	
1383	T	kaikkein (konkreetimmin) (in the most concrete way)	boys
1384		miks ne kak- (why those tw-)	talk in the
1385		mitkä ne kaks ihmis(ryhmää) on (what are the two groups of people)	backgroun
1386		°tavallaa siihe (0.2) liittyy° (in a way relation to it)	at the
1387		(0.7)	same time
1388	T	uhh Anne	
1389	S →	noissa kehitysmaissa	

		(in those developing countries)	
1390	T	°joo°	
1391		(2.7)	
1392	T	mää laitan TEOLlistuneet maat ja kehitysmaat (I put here the industrial countries and the developing countries)	

Transcript 4

1492	T	no mitä siitä energian käytöstä (0.6) (well what about the energy use)	
1493	T	mitä siitä keskusteltiin (0.3) (what was discussed)	
1494	T	aa Pertti	
1495	S	(noisko tuo) (0.3) ydinvoima (well would that nuclear power)	
1496		(että oikeutettu ku siinä o vähä saasteita mut) (0.9) (that justified as there is only some pollution but)	
1497		toisaalta ehotettii sitä että (0.4) (but on the other it was suggested that)	
1498		miten ne ydinjätteet vaikuttaa sitte (how the nuclear waste affects then)	
1499		maaperässä sitte myöhemmin (in the soil later on)	
1500		(2.0)	
1501	T	joo (yes)	
1502		(16.0)	
1503	T	tuolla tavalla ja (like that and)	
1504	S→	ja sit siinä on vielä tosta au- (and then there is about the sol-)	
1505		aurinkovoimasta (solar energy)	
1506	T	joo (yes)	
1507	S	että voisko sitä käyttää enemmän? ja (that could it be used more)	
1508		(5.6)	
1509	S	se on täysin saasteetonta mutta [<aika>] (it is fully pollution free but quite)	
1510	T	[joo] (yes)	
1511	S	vaikeeta (difficult)	
1512		eikä kallista ja (0.3) (and not expensive and)	
1513		eikä sitä voi käyttää kaikkialla (it cannot be used everywhere)	
1514		(28.6)	
1515	T	liittykös tähä jotain (0.3) muuta? (is there anything else related to this)	
1516		(5.3)	
1517	T	siinä o varmaa se (0.2) (it is probably the)	
1518		perus (0.5) kritiikit tai argumentit siitä (0.8)	

		(basic criticism and arguments about that)	
1519		\<energia\> (0.3) muodosta tulevaisuudessa (energy form in the future)	

Transcript 5

683	T	monien luonnonvarojen tarve lisääntyy (the need for natural resources is going to increase)	
684		(8.9)	
685	T	\>haluaako joku\< kokeilla (would someone like to have a go)	
686		tarjota vaihtoehtoja (offer options)	
687		(tai) Lassi jotai (or Lassi something)	
688	S	no (0.4) mää en tiiä mikä toi öö lisääntyä ja vaikka (well I don't know what that aa increase and although)	
689		jos sää ne mulle sanot (if you tell me those)	
690		niin voin mää sitten [koke]illa= (then I can try)	
691	T	[no] (well)	
692	T	=increase ja although	
693	LM1	okei öö (1.1) (ok aa)	
694		the need of (0.2) (*natural*) resources (0.2) °are going to° (0.7)	
695		\<in (.) krhm cread\> (0.6) although even today (1.1)	
696	● →	\<krhm ev- (0.2) ev'ry inhabitant in a-\> in the earth (0.4)	
697	● →	haven't (0.7) \>hasn' **haven't** got a\< possibility to (1.3)	
698		öö clean drinking water	
699	T	↑joo (0.5) (yes)	
700		se oli ihan hy↓vä (that was fine)	

Transcript 6

723	T	ts .hh \>ja sitte ois vie↑lä **pari** (and then there are a couple of more)	
724		viitonen (number five)	
725		eräs pahimpia ongelmia on (one of the worst problems is)	
726		minkälainen vaikutus korkea aktiivisella **ydin**jätteellä\< (0.5) (what kind of effect high nuclear waste)	
727		°on ympäristön tulevaisuudessa° (will have on the environment in the future)	
728		(1.7)	
729	T	Osku	
730	S	one of the most (0.2) krhm worst problems is that	
731	● →	what kind of an of- **effec**t does high level nuclear waste has	
732		for environment (°in the future°)	
733	T	joo	

		(yes)	

Transcript 7

1437	T	nii katotaa sitte mitä sanottii avaruustutkimuksesta (ok then we could look at what was said about space exploration)	
1438		(1.5)	
1439	T	mitä siinä oli se (what was there)	
1440		tavallaan se perusvastakkainasettelu (0.2) (in a way the basic side arrangement)	
1441		Lassi	
1442	S	<no se että> siihe on tuhlattu (well that it has been wasted)	
1443		hirvee määrä rahaa ja (0.2) (a lot of money and)	
1444		hyödyt o (.) ollu suhteellisen pienet (0.2) (the benefits have been relatively small)	
1445		mutta (0.5) (periaattees) (x) oikei hyödyntämää sitä (but in general not utilize it)	
1446	→	niitä kaikkia ilmiöitä (0.3) (all the phenomena)	
1447		pystytään tutkimaa jotai (something can be explored)	
1448		(1.1)	
1449	S →	avo- asuttamista (muu muassa) (populating among other things)	
1450		(23.0)	

8 BIBLIOGRAPHY

Arminen, I. 2005. Institutional Interaction Studies of Talk at Work. *Directions in Ethnomethodology and Conversation Analysis*. Great Britain: Ashgate.

Cazden, C. B. 2001. *Classroom Discourse*. The Language of Teaching and Learning. Portsmouth: Heinemann.

Hall, J. K. 2007. Redressing the Roles of Correction and Repair in Research on Second and Foreign Language Learning, *Modern Language journal* 91 (4), 511-526.

Hutchby, I. and R. Wooffitt 2007. *Conversation Analysis*. Great Britain: Polity Press.

Jefferson, G., H. Sacks and E.A Schegloff 1977. *The Preference for Self-Correction in the Organization of Repair in Conversation.* Schegloff Publications Archive. (11 Nov 2005) http://www.sscnet.ucla.edu/soc/faculty/schegloff/pubs/.

Kasper, G. 1986. Repair in Foreign Language Teaching. In G. Kasper (ed.), *Learning, Teaching and Communication in the Foreign Language Classroom,* Aarhus: University Press, 12-29.

Kurhila, S. 2000. Keskustelunanalyysin esittelyä ja rajankäyntiä – kakkoskielisten keskustelujen haaste. In K. Sajavaara and A. Piirainen-Marsh (eds.) *Kieli, diskurssi & yhteisö.* Jyväskylän yliopisto: Soveltavan kielentutkimuksen keskus, 359-381.

Kurhila, S. 2003. *Co-constructing understanding in second language conversation*. Helsingin yliopisto: Suomen kielen laitos.

Lee, Y. A. 2007. Third turn position in teacher talk: Contingency and the work of teaching. *Journal of Pragmatics* 39, 1204-1230.

MacBeth, D. 2004. The relevance of repair for classroom correction. *Language in society* 33 (5), 703-736.

McHoul, A. W. 1990. The organization of repair in classroom talk. In D. Hymes, A. D. Grimshaw and W. Labov (eds.) *Language in society* 19 (3) 349-377.

Ohta, A. S. 2000. Rethinking Recasts: A Learner-Centered Examination of

Corrective Feedback in the Japanese Language Classroom. In J. K. Hall and L. S. Verplaetse (eds.), *Second and foreign language learning through classroom interaction*. London: Lawrence Erlbaum Associates, 47-71.

Sunderland, J. 2001. Student Initiation, Teacher Response, Student Follow-Up: Towards an Appreciation of Student-Initiated IRFs in the Language Classroom. (26 Feb 2008) http://www.ling.lancs.ac.uk/groups/crile/docs/crile55sunderl.pdf.

Tainio, L. (ed.). 2004. Vuorovaikutusta luokkahuoneessa. *Näkökulmana keskustelunanalyysi*. Helsinki: Gaudeamus.

Van Lier, L. 1994. *The Classroom and the Language Learner.* Applied Linguistics and Language Study. London and New York: Longman.

Walz, J. C. 1982. Error Correction Techniques for the FL Classroom. *Language in education, Theory and Practice*. USA: The Center for Applied Linguistics and Harcourt Brace Jovanovich, Inc.