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Multilingual children between real and imaginary worlds

Language play as resignifying practice

ABSTRACT

This article analyzes how a group of multilingual children in their early adolescence use various forms of language play and position themselves symbolically through involvement in signifying practices. By developing a conceptual framework that combines insights on language play (Cook 2000) and the signifying self (Kramsch 2009) it demonstrates how the children as sign makers and symbolic subjects (re)signify their own learning space. The analysis reveals how, during a reading and joint text construction activity in Danish, they explore the symbolic possibilities of signs and subjectivities, while moving in and out of the text and back and forth between imagined and real worlds. These findings illustrate how the children's interest both shapes their playful interaction and *takes shape* through it. It furthermore shows how language play contributes to paving the way for a resignification of a potentially vulnerable learner position to a subject position as audible. The paper argues that a detailed focus on children's signifying practices that includes the interactional development of interest can broaden our understanding of language play and its transformative potential.

INTRODUCTION

With the arguments in this article we develop and extend discussions in applied linguistics about the role of language play in language and literacy learning. Framed by a social semiotic perspective on children's meaning making, we analyze how a group of multilingual children position themselves symbolically through their participation and involvement in signifying practices in Danish, and how language play contributes to paving the way for a resignification of a potentially vulnerable learner position to a subject position as audible. For multilingual children a lot can be at stake because linguistic participation is not only about using and learning languages. It is also a question of 'becoming audible' (Miller 1999) in a new language, that is, to be heard and recognized as a legitimate speaker on one's own premises when interacting with others.

As a point of departure we discuss Kramsch's (2009) and Cook's (2000) inquiries into the continuing focus in applied linguistics on the referential dimension of language, a focus which, despite an increasing interest in language play and creativity, is still highly prevalent in educational discourse. Nevertheless, language is also a means to self-representation which brings language use and learning in close proximity to the negotiation of social identity (Kolstrup 2015; Norton 2000; Pavlenko and Blackledge 2004) and to becoming a signifying subject, identifying and taking advantage of the symbolic possibilities and power of language to act on the world (Kramsch 2009; Laursen and Mogensen 2016b).

The data comes from a larger, longitudinal research project focusing on multilingual children's social and semiotic literacy practices. In it, five classrooms with a large linguistic diversity are followed for nine years. The specific linguistic make-up of each of these classrooms varies but is, as with many classrooms in urban settings, composed of pupils with different and multiple linguistic repertoires. The activity in focus for the analysis is called 'Legogloss' and designed with a general aim of providing insights into children's meaning making processes during their reading of a text in Danish. When we first looked through the video recordings, we found the variance between the children's interactions – in terms of how they involved themselves in the meaning making processes and the affective space that took shape around them – striking. Foremost was how the activity, despite a consistent set-up, developed quite differently from group to group. In addition, we found it remarkable how some recordings, from a meaning making and learning perspective, seemed to accommodate far greater pedagogical potentials than others. This was especially significant in the recordings that involved children who did not have Danish as their (only) mother tongue and who, judging from their verbal and bodily reactions, found the assigned text difficult to understand.

The initial observations of the complexity and variation of the children's symbolic actions during the activity made us re-watch a number of the recordings while paying special attention to how the children used the symbolic possibilities of language. When we got closer to these signifying practices, language play increasingly stood out as a significant characteristic. Drawing on these observations and on Kramsch's (2009) emphasis on how subject positions are shaped through people's manipulation of symbolic signs, in this article we dive into a particular Legogloss recording to explore how three young adolescents involve themselves in signifying practices in Danish and how they participate and position themselves symbolically during the

activity. We illustrate how one child, a newcomer to Danish, uses language as a symbolic system to act on the world and become audible during her interaction with two other multilingual children. Together the three of them continuously explore the symbolic possibilities of language, resulting in a resignification of both the learning space and the text as well as their own subjectivities and social identities.

THEORETICAL BACKGROUND

Language play as resignifying practice

Kramsch (2009) points out how second language research concerned with both the favourable conditions for and the negotiation of social identities in language learning has tended to focus on language as means to accomplish certain pragmatic goals. In this line of thought, she writes, language is viewed as ‘a transparent and neutral tool for the formulation of thought, for interpersonal communication, and social interaction’ and as a ‘tool for rational thinking, for the expression and communication of factual truths and information, and for the description of a stable and common-agreed-upon reality’ (Kramsch 2009: 2). Cook (2000) links this referential focus in current applied linguistics to what he calls ‘the primacy of meaning’ (p. 162). He argues the dominant discourse in second language education throughout the past decades has centered around such meaning-based language teaching – especially on what he calls ‘meaning-mainly’, originating in task-based-instruction (Long 1983). According to this line of ‘meaning-mainly’ thinking, language teaching should be structured around communicative activities while attention to linguistic forms should only occur when necessitated by communicative difficulties. Classroom procedures are planned around a series of educational tasks related to the learners’ actual or future language needs designed ‘as successively more complex approximations to the *target tasks* that a task-based needs analysis has identified as facing the learner’ (Long and Robinson 1998: 23, italics in original) for instance attending a job interview or reading a menu.

However, recent research into language play has begun to challenge this ‘meaning-mainly’ focus by thoroughly documenting how language play is both different from, and much more than, merely a distraction or an extra spice to communication (see Bell 2005; Belz 2002; Broner and Tarone 2001; Bushnell 2008; Cekaite and Aronsson 2005; Cook 2000; Forman 2011; Pomerantz and Bell 2011; Tarone 2000). These studies point to language play as a prevailing characteristic in everyday language use and demonstrate how it contributes significantly to the

organization of social interaction in language teaching. Crucially, this research also indicates that play can facilitate language learning. While most studies to date have focused on describing the types and functions of language play in a language learning perspective, others have linked language play more explicitly to self and identity work (Belz 2002; Pomerantz and Bell 2011). Belz (2002) argues how language play ‘may also serve as a textual representation of the learner’s developing symbolic freedom in and through a second language’ (p. 35), while Pomerantz and Bell (2011) show how a group of foreign language learners, through play and humor, ‘shaped the language-learning situation (...) and constructed new ways of interacting and new subject positions’ (p. 158).

Despite recent research showing how behaviors perceived by some teachers and researchers as off-task can be helpful for students (see Iddings and McCafferty 2007; Kamberelis 2001; Maybin 2007), the dominant focus on the referential aspects of language is still evident in much language education. In Denmark, there is a growing tendency to link ‘best practices’ in school education to the ‘cooperative learning’ method (Kagan 1992), and furthermore to highlight this method as especially suitable for bilingual children. For instance, in an article in the national daily newspaper, *Politiken*, an educational researcher recently linked the increased incorporation of cooperative learning in Danish schools to successful test results. In arguing that this approach accounted for why more bilinguals were now passing the final examinations for primary and lower secondary school (Danish ‘Folkeskole’ runs from 6-16 years of age), he explained: “various studies point to how the schools have become better at cooperative learning (...) and at including group processes. It has had a very obvious effect in relation to getting more of those [bilingual] pupils through, who would have otherwise just been playing games or making trouble” (*Politiken*, 13 April 2016, *our translation*)

The cooperative learning method is comprised by so-called ‘cooperative learning structures’, described by Kagan and Stenlev (2010) as content-free interactional patterns where pupils work in pairs or groups to solve a given assignment. Each structure consists of a series of predefined steps, such as discussing, analysing, and developing ideas, that the pupils work through. The presentation of the method involves very explicit and detailed procedures of the concrete speech acts and interactional dynamics expected. Its procedures build on an assumption about the involved participants as equal, polite, and rational individuals who cooperatively orient themselves towards solving the (academic) assignment (Bucharadt and Laursen 2013).

Furthermore, the description of the method as a guard against 'off-task behavior' (Stenlev 2003: 33) assumes it is not only possible but also desirable to eliminate speech acts not directly oriented at the assignment. Thus 'off-task behavior' is considered a threat against effective communication and language acquisition. The latter assumption echoes research on the relationship between classroom behavior and academic outcomes, proposing the more time pupils spend off-task (i.e. 'engaged in behaviors where learning from the material is not the primary goal' [Baker *et al.* 2004: 384]) the less they learn (e.g. Baker *et al.* 2004; Carroll 1963; Rowe *et al.* 2009).

In the Legogloss-recordings, we saw multilingual children's language use take far more complex functions than the instrumental ones constituted in the above mentioned (and other communicative) language teaching approaches. Moreover, we found it difficult to recognize the understanding of on-task/off-task behavior as dichotomous entities. Rather, our observations made us increasingly aware of how linguistic and other semiotic resources were employed simultaneously in both conventional and unconventional ways. In this paper, the analytical focus is on a recording in which this practice was particularly evident. It explores the connections between language play and subjectivity, and thus further develops previous work by showing how Kramsch's (2009) conceptualization of the signifying self helps broaden our scholarly understanding of the functions of language play and the issue of becoming audible (Miller 1999).

DATA AND SETTING

The broader frame: The research project *Signs of Language*

The data used in this study is part of the ongoing abovementioned project, a larger longitudinal study about literacy and multilingual children – *Signs of Language* – conducted in five classrooms in five different cities in Denmark. The ethnic and linguistic composition differs between schools but all are characterized by a large degree of linguistic heterogeneity in continual flux because of the in- and outflow of pupils. At the beginning of the project in 2008, the children were in year 1 (6-7 years old). At the time of writing, in autumn 2016, they are in year 9 (14-15 years old). The sub-study presented here is situated at a school with approximately 400 pupils of which 190, on the school's webpage, are described as 'bilingual (that is, of another linguistic background than Danish)' (our translation). This group of pupils comprises children from immigrant and refugee families from various countries – the webpage mentions that 21

nationalities are represented – and at the school there are two reception classes in which newly-arrived bilingual pupils are offered ‘basic lessons’ in Danish prior to being put in a mainstream classroom. Thereafter, all bilingual pupils follow ‘the Danish-medium national curriculum’, with (if deemed necessary) supplementary Danish lessons in or outside the mainstream classes.

Data are collected through a mixture of classroom observations and interventions as well as various researcher generated activities carried out in smaller groups of 3-4 pupils. All activities are videotaped. The overall aim of *Signs of Language* is getting insight into various aspects of pupils’ meaning making processes when engaged in literacy activities (Daugaard and Laursen 2012; Laursen 2013a, 2013b; Laursen and Fabrin 2013; Laursen and Mogensen 2016a, 2016b). These meaning making processes are understood in a social semiotic frame where the individual is viewed as a symbolic subject in constant interaction with the changing semiotic resources in the surroundings. They are not just sign users but also sign makers because signs are understood as ‘motivated conjunctions of meaning and form’ (Kress 2001: 405). Recognizing the sign maker perspective makes the *interest* of the agent crucial for the analysis of meaning making processes. Interest is defined as ‘the articulation and realization of an individual’s relationship to an object or event, acting out of that social complex at a particular moment, in the context of an interaction with other constitutive factors of the situation which are considered as relevant by the individual’ (Kress 1993: 174). For us, this sign maker perspective – involving both the external production of signs in processes of writing and the internal production of signs in processes of reading – opens up possibilities for examining the transformative processes involved in the children’s interaction with the text in the Legogloss activity.

The activity

The Legogloss activity is a researcher generated activity that took place in early 2015 when the pupils were in year 7 (12-13 years old). The name of the activity is motivated by the Latin *lego* ‘to collect’, or ‘bringing together’, and ‘to read’. It is inspired by the Dictogloss, but whereas the Dictogloss is based on the participants’ individual notes of a read-out-loud text, the Legogloss is based on individual notes of a short written text. The text came from the Danish State Railway’s free monthly magazine: *Ud & Se* ‘Out & See’, that in 2012-2013 ran a theme about research. It is a one-page article called *Havets usynlige liv* ‘The invisible life of the ocean’ (see Appendix 2) about the copepod. Half the page consists of a large picture with a short descriptive text while the

other half consists of the main text describing how the female copepod, despite not being able to hear or see, attracts the male copepod by releasing an odor called a 'love-hormone'. It is introduced with a reference to a fairy tale by Hans Christian Andersen, *The drop of water*, and also contains a text box with a short citation from the fairy tale about how with a magnifying glass it is possible to see unusual animals in one single drop of water.

The activity aimed at gaining insight into both the individual child's understanding of the text and into the interactional meaning making processes during its reconstruction. To achieve these goals, the activity was divided into three phases: first, two rounds of individual reading of the text followed by taking notes while not looking in the text; second, a joint reconstructing of the text by exchanging notes and talking about it; third, a conversation led by the research assistant about the children's perception of the texts and their experience of the activity (see Appendix 4).

Data and participants

The participants in the group we focus on in the following analysis are three girls: Nujalina, Nanna and Tora. Nujalina grew up in Greenland speaking mainly Greenlandic at home. Upon her arrival in Denmark in 2009, she spent the end of year 1 in a reception class. She was fully integrated in the mainstream classroom from the beginning of year 3. Nanna also grew up with Greenlandic parents, but contrary to Nujalina, she reports being most comfortable speaking Danish as it is the main language spoken at home. Nanna was born in Denmark where she lived till she was 6 years old when she moved with her family to Greenland. She joined this class when returning to Denmark in the beginning of year 7. The third participant, Tora, was born and lived in Israel until early 2012 with Hebrew speaking parents and siblings. Upon her arrival in Denmark, she joined a reception class for 1½ years before joining the mainstream classroom in August 2013, in the beginning of year 6. During classes, Tora has a software called 'AppWriter' available on her laptop. It reads aloud texts and is given to pupils in the school who are considered learners of Danish or who have dyslectic problems. However, the app did not work with the Legogloss-text so the research assistant, Winnie, took Tora to another room to read the text aloud for her while Nanna and Nujalina read by themselves. Winnie was present in the room throughout the text construction, though seated outside the video frame.

The full recording (60 minutes) was first transcribed in a rough version. After looking through the recording several times, we made more detailed transcriptions of passages in which language play took central stage in order to document the interactional and phonetical details (see transcription convention in Appendix 1). In addition to the transcripts, the analysis also builds on the children's notes from phase 1 of the activity (see Appendix 3) and their cooperatively constructed text (see Figure 1).

ANALYSIS

The joint text construction

The four excerpts for the analysis come from the second phase of the Legogloss activity in which the children reconstruct the text. The excerpts appear in chronological order and demonstrate how the children's language play develops and functions as signifying practices making various subject positions available. In this process, we see how linguistic forms – e.g. certain words, syllables, phrasings – serve as 'catalysts' (Cook 2000: 58) between real and imaginary worlds and how they arise in interaction with the children's interests.

The analysis focuses particularly on the behavior and actions of Tora who is a 'newcomer' (Kramsch 2009: 30) to the Danish language. Four times in the hour long recording she more explicitly positions herself as such, referring to aspects of her linguistic competence as somehow flawed or imperfect. One of these times is in the lead-in to the joint text construction when she says: 'I don't think you should look at mine [my notes] because I have many spelling mistakes so (.) that is not so good'. Her statement ends with a self-evaluation about spelling mistakes as undesirable by which she positions herself as aware of how her Danish language use breaches conventional practice. Despite these self-evaluations, generally, Tora is in no way shy to speak up. This becomes evident throughout the recording; she has a playful approach to word searches and reading aloud difficult words and sentences in Danish, often substituting word endings or stretches of text with gibberish sounds bearing iconic resemblance to the intonation patterns of Danish. For instance, in phase 1, the children take turn reading aloud for each other and Tora reads *torskelarve* 'cod larva' as **tr:o:s:kealalalalala* and *vingesnegl* 'sea slug' as **vinkeululululu*. Both times Nujalina, Nanna and Winnie show their sympathy for her struggles through a short laughter. Winnie furthermore encourages her to keep reading with 'yes's' and by helping her to pronounce some of the words.

Before diving into the joint text construction, the children agree to read aloud for each other their individual notes (see Appendix 3). Next, Nujalina volunteers to write the joint text and swaps seat with Tora to sit between Nanna and Tora (see Caption 1). They then discuss the genre of the text and whether they want to turn the paper in landscape or portrait position before agreeing on beginning with the title: ‘The invisible life of the ocean’. Their final text is pictured in Figure 1. Their interaction throughout the joint text construction is characterized by both an exploration through open questions, attempts of phrasing, and a joint interest centering on males, females, and hormones which often seems to emerge in various playful forms in the delay between the negotiations of the next sentence and Nujalina writing down what they have agreed upon.

<p>Havets usynlige liv</p> <p>I 100 liter vand er der et stort del af de vandbakterier/vand insekter en af dem er vandløpper.</p> <p>Vandløpper</p> <p>Vidste du at der er hun vandløpper og -han vandløpper, Men de har ikke noget syn eller hørelse, Men de har duft hormoner og hun vandløpperne tiltrækker han vandløpperne med deres homønduft, det vigtigste for vand insekter er at spise, overleve og formere sig</p>	<p><i>The invisible life of the ocean</i></p> <p><i>In 100 liters of water there is *a *large part of *those water *bacteria/water insects one of them are copepods.</i></p> <p><i>Copepods</i></p> <p><i>Did you know that there are female copepods and *-male copepods, but they have not any vision or *hearing, but they have odor hormones</i> <i>*hormones</i> <i>and the female copepods attract the male copepods with their *hormone odor, the most important For water insects is to eat, survive, and reproduce</i></p>
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Figure 1. The final text by Tora, Nujalina and Nanna.

Married or dating? Exploring possibilities of the self

Already at the beginning of the joint text construction, a play with real and imaginary worlds form a ‘double framing’ (see Bushnell 2008) that comes to characterize this whole phase of the activity. Excerpt 1 demonstrates how Tora introduces Nanna and Nujalina to an incident that is unrelated to the Legogloss-activity, namely what happened between her and Cengiz, a boy from

their class, just before they left the classroom. Nujalina is writing down the title but looks up when Tora blurts out how she has just ‘gotten married’ to Cengiz (l. 2). Tora’s story results in a mixing of an imagined world where children can marry and a real world where children can not marry but have a boyfriend or girlfriend.

Excerpt 1 (29:20-29:45)

- 1 Tora: men hvad hedder det: (0.4) .ts (0.4) >jeg er
but what is it called I have
- 2 lige blevet *giftet< med Cengiz og så: jeg skal
just gotten married to Cengiz and then I have to
- 3 gå (0.8) h@@[@
leave
- 4 Nanna: [a[hvad?
a what
- 5 ((*comps a lock of hair with the fingers in front of her face*))
- 6 Nuj a: [hvad for noget
what for something (what was that)
- 7 Tora: det ba@[@
its just
- 8 Nuj a: [er dig og Cengiz [kær?ester¹
are you and Cengiz dating
- 9 Tora: [h@
- 10 Tora: @ne: :j ad (0.6) fordi: Cengiz sidder sån her
no ew because Cengiz sits like this
- 11 () (.) og så han spørg mig (.) *skave skal vi
and then he asks me should we
- 12 giftes så (.) selvfølgelig (.) ↑og ↑så (.) er vi gift@
marry then of course and then we are married
- 13 n@u@ (0.5) ↑a: :. ((*inhalation*)) a: :h han skal
now he will
- 14 ikke være min kæreste (da: :v) ((*swings with a hand*)
not be my boyfriend
- 15 *her hair from right to left, Nanna braids a lock of*
- 16 *hair. Nujalina and Tora looks at Nanna. See Caption 1)*
- 17 (0.3)
- 18 Tora: s: uper sj o@v .j a: ((*whispering*)) okay
super funny yes okay
- 19 vi skal skrive mere
we have to write more
- 20 (0.4)
- 21 Nuj a: °okay° havets usynlige liv.
okay the ocean’s invisible life

¹ In Danish *kæreste* translates most accurately to “sweetheart” in English. However, to match modern language use, we translate *kæreste* to ‘dating’ or ‘boyfriend’ depending on the utterance in which it occur.

Video caption 1 (29:39)

When Tora tells how she has just gotten married to Cengiz (ll. 1-3), her story is received with disbelief by both Nanna and Nujalina who in overlap say: ‘a what’ and ‘what was that’ (ll. 6-7). Tora, while laughing (l. 7), begins what seems to be an explanation, ‘it’s just’, but is interrupted by Nujalina with a clarifying question: ‘are you and Cengiz dating’ (l. 8). Thus, what seems to evoke disbelief is the word ‘married’. Instead Nujalina translates or interprets Tora’s language use into what is possible in a children’s world, namely to have a boyfriend or a girlfriend. Thereby she discontinues Tora’s imaginary world in which she married Cengiz. In excerpt 1, Tora marks the contrast between the imaginary and the real world in several ways: the imaginary world, in which she has gotten married, is marked by laughter, while in the real world she distances herself from Cengiz through an expression of dislike, ‘ew’ (l. 10), and by explicitly turning down the possibility of them dating (ll. 13-14). In telling Nanna and Nujalina about the incident, she creates an imaginary world that allows her to explore ‘possibilities of the self’ (Kramsch 2009: 15); in this case, a world in which she is wife-worthy. In the conversation with Nanna and Nujalina this told-about status also positions her as desirable to boys.

Even though Tora, in excerpt 1, doesn’t manage to get the other children to play along in her imaginary world, their prompt responses of disbelief evidence their interest in the subject of boys, girls, and dating – not an unusual interest for young adolescents. This interest is moreover evident in their bodily communication when Nanna and Tora touch their long loose-hanging hair. Nujalina’s hair is also long, but she wears hers in a ponytail and she has her hands occupied with

writing. Throughout excerpt 1, Nanna is busy combing a lock of hair with her fingers in front of her face. In line 15 she begins to braid it which catches the attention of both Tora and Nujalina who look at her (l. 16). Tora also touches her hair when throwing it from one side to the other while stating ‘he will not be my boyfriend’ (ll. 13-14) (see Caption 1). At this point, the hair is not given any verbal attention while later, in excerpt 4, hair becomes a verbally explicit semiotic resource. The simultaneity of Tora’s hair-throwing and rejection of having Cengiz as a boyfriend suggests that she, and Nanna, draw on their hair as a feminine index, thus, the hair functions as a symbolic means to position themselves as feminine and desirable for boys.

The conversation about Cengiz is ended by Tora who brings them back on activity-topic, marked with a difference in voice quality from whispering (l. 18) to normal voice (l. 19) and an explicit transitional remark: ‘okay we have to write more’ (l. 19). With this remark she positions herself as a ‘good’ pupil, bringing their conversation back to the topic showing awareness of some topics being more appropriate, or on-task, than others. In excerpt 2, the interest in the attraction between specific boys and girls, Tora and Cengiz, moves towards a more general interest in the attraction between girls and boys and becomes interwoven with the copepod-topic.

Anthropomorphizing copepods

In the minutes following excerpt 1, the children discuss, agree on, and write down the first sentence of their joint text: ‘In 100 liters of water there is *a *large part of *those water *bacteria/water insects one of them are copepods’ (see Figure 1). Four minutes later, in excerpt 2, Tora reintroduces the theme about human boys and girls, this time much more intimately linked to the joint text activity. As in excerpt 1, her laughter marks the playful nature of her suggestion when she combines semantic components in an unconventional way creating an anthropomorphism of copepods (ll. 2-3: ‘boy’, ‘girl’; ll. 28-29: ‘cool’, ‘hot’). The excerpt begins when Tora (l. 1) suggests how to continue their text, shortly after Nujalina is done writing down the first sentence of their joint text:

Uddrag 2 (33:55-34:47)

01	Tora:	øhm (1. 0)	vidste du go: dt a: t (0. 5)	a: t (0. 3)
		<i>uhm</i>	<i>did you know</i>	<i>that that</i>
02		der er (1. 3)	pi geva@nd@l o@ppe (0. 3)	o@g e@n
		<i>there are</i>	<i>girl copepods</i>	<i>and a</i>
03		dre@[ng@		

- boy*
- 04 Nanna: [*hun*vandl opper og >*han*vand°l opper° <²
female copepods and male copepods
- 05 Tora: ja:
yes
- 06 (2.5)
- 07 Nanna: var det ikke også noget med at- (.) at:: (.)
was it not also something about that that
- 08 °de° der: *hun*vandl opper tiltrækker en duft
those female copepods attract an odor
- 09 ((looks at Tora while squinting her eyes))
 (...)
- 26 Nuj a: der: er: ((writing))
there is
- 27 (0.5)
- 28 Tora: mange seje ting (.) ligesom vand#lopper# (.) .ts de:
many cool things like copepods they're
- 29 *så:* #lækker# ej³ det for sjø@[v
so hot nah it's for fun (I'm just kidding)
- 30 Nuj a: [(*<hvad hedder det>*)
what is it called
- 31 jeg var lige ved at skrive det:
I was just writing that
- 32 Tora: øh: (0.3) der er:: (.) øh:: hun- (.) altså: (.)
uh there are uh female well
- 33 pi ge>vand: lopperpepe<
girl copepodpodpod

Tora's laughter in lines 2-3, while she is saying 'girl copepod and a boy', indicates that she is again entering an imaginary world. By playfully combining the words 'girl' and 'boy', traditionally used about humans, with 'copepods' she draws on the symbolic power of language to create new and unexpected imaginary worlds: in this case one anthropomorphizing copepods. Her play with semantic meaning not only creates a new world, but also witnesses how her interest in the activity develops: to her the copepod text is not simply interesting for the new factual biological information that it provides; it seems to be through, or in interaction with, her own interest in the attraction of boys and girls in the human world that she enters the world of the copepods. As was the case in excerpt 1, neither Nanna nor Nujalina align with Tora's language play. Rather, they position themselves as guards against off-task behavior focusing on solving the

² The personal pronouns *han* 'he' and *hun* 'she' in Danish, are also used as gender ascriptions in the animal world translating to 'male' and 'female'.

³ In excerpt 2, 3, and 4, Tora uses the interjection *ej* several times. We have translated it differently in an attempt to best match the meaning in English in each of the specific utterances.

activity as called for and sticking to the real world universe of the text. Nujalina does so by ignoring Tora's language play while Nanna actively rejects it by interrupting Tora with a correction (l. 4). In the correction she emphasizes the conventional way of talking about the gender of copepods stressing the first syllables: 'female' and 'male'. Tora immediately drops the language play and aligns with Nanna by saying 'yes' (l. 5).

Nanna continues the conversation with a proposal that, in both intonation and her squinting eyes (l. 10), suggests her utterance is a serious attempt of remembering a part of the text: 'female copepods attract a smell' (l. 8). In the omitted lines (11-24), Tora first helps Nanna finding the word 'hormone-odor-like', before stating that they first need to write: 'did you know that there are' (see Figure 1).

In l. 26, Nujalina is reading slowly as she writes. Meanwhile, Tora again anthropomorphizes copepods by describing them as 'cool' (l. 28), and 'hot' (l. 29) – both are terms conventionally used in Danish about attractive humans. Nanna and Nujalina ignore her language play while Tora marks her playfulness with the use of creaky voice, laughter, and an explicit comment stating she is not serious: 'nah I'm just kidding' (l. 29).

In this episode, thus, through an exploitation of the semiotic possibilities of the sign, Tora brings together her interest and the text universe in a symbolic anthropomorphism. While both Nanna and Nujalina here resist engaging in the language play, in excerpt 3, 17 seconds later, we see them both engage with it and thereby help interactively shape their interest in the activity.

Rhythm and rhymes: Language as an object of aesthetic perception

In excerpt 1 and 2, we showed how Tora playfully creates imaginary worlds and alternative subject positions through pragmatic and semantic transformations. Furthermore, in excerpt 2, her language play became more form-focused when she experimented with a rhythmic pronunciation of *lopper* with a creaky voice (l. 28) and when she repeated the last syllable *-pe* in *pigevandloppepepe* (l. 33). While these elements were ignored by the other participants in excerpt 2, they receive explicit attention in excerpt 3 when the children all engage in play with the rhythmic nature of *lopper*, and the rhyme of *han*, 'male', and *vand*⁴, 'water' (l. 84). The *han-vand* rhyme transitions to a semantic play with Tora's invitation to imagine water was gendered (ll. 97-98).

⁴ The -d in *vand* is silent and, when used as a prefix, rhymes with *han*.

Excerpt 3: (35:04-35:47)

- 54 Tora: vandlopper
copepods
- 55 (0.5)
- 56 Tora: [årh: det er så sjovt at sige vandlopper
aah it is so fun saying copepods
- 57 Nuj a: [h: : un:
female
- 58 Nanna: h@m v[andlopper (0.2) lopper (.) lopperlopper
copepods
- 59 Tora: [vandlopper
copepods
- 60 Tora: [l::opper::
- 61 Nanna: [lopper
- 62 Tora: l::op#per::#
- 63 Nanna: l::opper::l:opper: [lopper
- 64 Tora: [l:::opper:: (.) ej det er sjovt
yeah it is fun
- 65 Nanna: nj a[@
m-yeah
- (...)
- 84 Nuj a: han: ? (0.7) vand? (0.2) ((reads aloud while writing))
male water (cope-)
- 85 hanva[nd ((smiles))
male water
- 86 Nanna: [hanvand
male water
- 87 Nuj a: [(han)
male
- 88 Nanna: [vand[mand vandhanen
water man (jellyfish) water tap
- 89 Tora: [h@@@@ h@ ((dances on the chair))
- 90 (0.3)
- 91 Nanna: vandh-
water h-
- 92 (0.5)
- 93 Tora: hanvand ((smiley voice))
male water
- 94 (0.4)
- 95 Nuj a: han[vand
male water
- 96 Nanna: [()
- 97 Tora: e:j <(det [kunne også være sjovt) hvis der stod>
yeah it could also be fun if there stood
- 98 hanvand? og hunvand.
male water and female water
- 99 (0.8)

100 Nuj a: hunvand h@@@[@:
 female water
101 Tora: [h↑@@@
102 Nanna: [h@: @:

Tora's enjoyment of the phonetic aspects of the word *lopper* becomes explicit in excerpt 3 when she states: 'it is so fun saying copepods' (l. 56). Her statement functions as an invitation for Nanna to join the language play while Nujalina keeps on writing. Nanna mimics Tora's play with *lopper* (ll. 58, 61, 63) taking a staccato form, changing the vowel sound, and extending the initial 'l' and final 'er' sound. Tora also plays with the use of creaky voice (l. 62) before she rounds off their language play with another statement, 'yeah it is fun' (l. 64) to which Nanna agrees with a short confirming laughter, 'n-yeah' (l. 65).

In the omitted lines (66-83), they all three agree on the next few words being 'and –male copepods' and Nujalina starts writing it down. In line 84 she is reading aloud for herself: *han* 'male' and *vand* 'water' and starts to smile. Nanna repeats the rhyme (l. 86) and extends it to similar rhymes: *vandmand* 'jellyfish' and *vandhanen* 'water tap' (l. 88). Nujalina and Nanna's rhymes make Tora laugh while she continues dancing on her chair (l. 89) seemingly delighted by Nanna and Nujalina having entered the symbolic game and thus aligning with her playful position. Tora repeats *hanvand* in a smiley voice (l. 93) and extends the phonetic language play to a semantic play when she explicitly invites the others to imagine water was gendered: 'it could also be fun if there stood male water and female water' (ll. 97-98). In this language play she exploits the compound word, *han/hunvandloppe*, consisting of three roots: *hun/han+vand+loppe*. *Vand+loppe* form the semantic stem to which *hun/han* is added to specify the gender of the copepod. What Tora does, motivated by Nujalina's rhyme, is to split the word unconventionally by combining *han/hun* with *vand*, leaving out *loppe*. Nanna and Nujalina do not immediately follow Tora's symbolic game suggested by the longer pause (l. 99) but when Nujalina (l. 100) repeats *hunvand* 'female water' and continues in laughter, they all three laugh (ll. 100-102) demonstrating that they align with the playfulness of Tora's suggestion.

The children's affective response of joy is triggered by aesthetic, here phonetic, aspects of language. When Tora invites Nujalina and Nanna to imagine a world in which water is gendered she playfully exploits the symbolic capacity of language with the conventional referential meaning in the copepod-text. According to Kramsch this is not unusual for newcomers to, or multilingual users of, a language because they are more likely to approach language as 'an object

of aesthetic perception’ (2009: 29) instead of a mere means for communication. This might be the case here where Tora succeeds to entertain and engage the others in the playful game by using rhythm and rhyme as catalyst into the imaginary world in which water is gendered. Thus, we see how the combination of ‘a wild and random element, to be controlled by language itself rather than by reality’ (Cook 2000: 49) and the children’s own interest in gender creates this imaginary world as well as providing opportunities for resignification of the space and the subject positions.

The resignification of *hormones*

In the final excerpt resignifying practices also take central stage when a conversation about hairdos between Nanna and Tora infiltrates Nujalina’s writing of their joint text. In the five minutes between excerpt 3 and 4, they continue their discussion on how to formulate the next sentence, now focusing on how copepods lack hearing and vision. This discussion has several more examples of phonetic language play when Nujalina smilingly says *han hun han hun* ‘he she he she’ and when Tora, again, substitutes stretches of her own utterance with gibberish sounds. The pre-sexual interest is also evident when Nanna asks Tora what she has written on her hands and Tora smilingly explains how she has named her breasts *Victoria* and *Hanna* because of ‘left’ and ‘right’ starting with V (*venstre*) and H (*højre*) in Danish. Just prior to excerpt 4, Tora jokingly uses the word ‘to fart’ as an anthropomorphic parallel to the odor the female copepods release to attract males. They then all talk about how Cengiz on several occasions has farted on girls in their class. At this point, Winnie interrupts their conversation, politely suggesting they continue with the text, and they all change the subject and agree on the next line for their joint text: ‘but they have not any vision or *hearing, but they have odor hormones’ (see Figure 1). The three last words: ‘have odor hormones’, Nujalina writes and reads for herself during excerpt 4 (ll. 4, 7). Meanwhile, Nanna experiments with different hairdos while Tora comments on them (ll. 1-2).

Excerpt 4 (41:00- 41:21)

- 1 Tora: der er også (*skole*) vandlopper- e: j det er faktisk
there are also (school) copepods no it is actually
- 2 meget flot ((*looks at Nanna who turns around as to*
very nice
- 3 *show Tora her hairdo: Caption 3)*
- 4 Nuj a: har: : (((*writes, reads for herself*))
have

5 (0.4)

6 Tora: altså her: [foran det ser lidt handicappet ud=
well here in the front it looks a bit handicapped

7 Nuj a: [°()° ((writes, reads for herself))

8 Tora: men bagved det er meget fl[ot ((puts her hands on her
but in the back it is very nice

9 own hair, first in front, Caption 4, then on the back))

10 Nanna: [°.h@ h[@° ((smiles big time))

(...)

21 Nuj a: [duft ((writes, reads aloud for herself))
odor

22 Tora: [ah::[: ((looks at Nanna who is changing her hairdo))

23 Nuj a: [hormoner jeg tror jeg skrev h:årmoner ((smiles and
hormones I think I wrote hairmones

24 looks from the text to Tora))

25 Tora: †ph@h@@ [h@

26 Nuj a: [prøv og se[: ((smiles, points in the text))
try and see (have a look)

27 Nanna: [°h:årmoner°
hairmones

28 Nuj a: h:årmoner
hairmones

Video caption 2 (41:02)

Video caption 3 (41:06)

In line 1, Tora seems to attempt to continue the text when she interrupts herself prompted by Nanna who turns around revealing a new hairdo (see Caption 2). In her self-interruption, Tora comments on Nanna's hairdo (ll. 1-2, 6, 8) while putting her hands to her own head to let Nanna know which parts of her hairdo look better than others (l. 6) (see Caption 3). During Tora and Nanna's hairdo-interaction, continuing in the omitted lines (11-20), Nujalina seems uninterested in participating in their play and is concentrated on writing. In line 23, however, she looks up at Tora and states: *hormoner jeg tror jeg skrev h:årmoner* 'hormones I think I wrote hair-mones'. Tora responds with a high pitch laughter (l. 25) while Nanna, with an emphasis and sound-prolongation similar to Nujalina's, repeats *h:årmoner*. In Danish, the first syllable *hor-* in

hormoner, though differently spelled, is homophonic with *hår* ‘hair’.⁵ The language play with the homophonic syllable, *hor-*, and the word, *hår*, captures the attention of all three children. Thus, this excerpt shows how Nanna and Tora’s common interest in hairdos infiltrates Nujalina’s apparent attempts to stay ‘on task’, resulting in a form of almost involuntary language play with *hormoner* that interweave with both the continuous boys-girls-attraction theme and the theme of the text.

The transformation of interest

The original text, ‘The invisible life of the ocean’, is framed by a fairy tale by Hans Christian Andersen. In their individual notes from the first phase of the Legogloss-activity, all three children note his name (see Appendix 3). However, in their final joint text (see Figure 1), Andersen does not make it in. As a matter of fact, he is not mentioned a single time by any of the children during the joint text construction phase. Instead, their interest in the original text gathers around females, males, hairdos, and hormones and it is this interactional developing interest that comes to guide their meaning making processes and how they move in and out of the text. While also actively engaged in the activity, it is Tora who from early on is interested in the attraction between girls and boys. At first, Nanna and Nujalina do not engage verbally with Tora’s attempts to create imaginary worlds around this interest but as the activity progresses, they increasingly align with her and thus adopt and engage in the interactional development of a joint interest. In this process, the children’s interest – through their investment in a symbolically and socially created imaginary world – leads to a shift in focus from Andersen to a focus on males, females, hair and hormones.

In the final phase, in which the children with the research assistant discuss their text and the reading and reconstructing process, their own awareness of this shift of focus becomes apparent: As Winnie is taking a seat at the table to initiate the ending discussion, Tora in an eager voice tells Winnie: ‘this one we wrote (.) is a lot better than that one [points from their own text on the table to the original text in Winnie’s hand]’. Winnie doesn’t follow up at this point but 5 minutes later, they talk about the content of the text when Tora says ‘but I don’t understand what has H C Andersen to do with it’. They talk briefly about who Andersen is and Winnie explains

⁵ When pronounced individually, *hår*, in standard Danish is pronounced with a glottal stop which is cancelled in compound words, e.g. *hårbørste* (‘hair brush’).

for a minute followed by Tora declaring: ‘I don’t know but I don’t think it is very important that with H C Andersen because one just drags time with it’.

DISCUSSION AND CONCLUSION

In this article we have analyzed how a group of multilingual children in their early adolescence, during a reading and joint text construction activity, position themselves symbolically through their participation and involvement in signifying practices in Danish. We have found the theoretical combination of language play and the signifying self a fertile ground for developing a more comprehensive understanding of how children as sign makers and symbolic subjects (re)signify their own learning space. In Kramsch’s words ‘[s]ubjective use of language removes individuals from their here-and-now responsibilities, allowing for play, irony, distance, and the integration of language use into a freer realm of subjective perceptions and meanings’ (2009: 43). In our analysis, this freer realm led to a wider range of subject positions, when the text reading assignment interacted with the emerging interest of the children. In this process, the text is transformed, and so is the subjectivity of the children, the social relations, and the learning space.

This social semiotic focus on children’s language play as symbolically signifying practice, helps us gain important insights into social and subjective aspects of the learning process: Language use is not merely a means of representation connected to solving the assignment and to social work on face, it is also a site of construction of new inhabited linguistic worlds filled with subjective, relational, and emotional perceptions and values. During the course of the activity the children move back and forth between the text world and imaginary worlds, between linguistic forms and meanings, between verbal and non-verbal symbolic activities, and – more generally – between on- and off-task behaviors, making the boundaries between such dichotomies increasingly blurry. This finding goes against the strand of language pedagogies that assumes pupil talk is either on-task or off-task. In this strand, that in the Danish context is actualized by ‘cooperative learning’, off-task behavior constitutes ‘a symptom of disengagement from a learning experience’ (Rowe *et al.* 2009: 100). While the participants in our case enact this distinction when evaluating some behaviour as more ‘appropriate’ than others, it would be mistaken to classify their off-task behaviour as disengaged from the assigned task. Rather, we see how the children draw on various semiotic resources and explore their meaning making potentials in ways that may actually contribute to the learning process by paving the way for a

resignification of the learning space. In this resignification process, the learning space is transformed to a heteroglossic discursive realm to promote a creative intertwining of the young adolescents' social worlds and interest in their academic interaction with the reading task. Although the children move in and out of the task, it is hard to see these movements as a disruption of their academic engagement as their dynamic interaction, particularly brought about by language playing practices, seems to strengthen their involvement and investment in both the reading assignment and their social relationship.

Tora is by far the one of the participants who takes the most initiative on the various kinds of language play in these data. In so doing, she draws her newcomer perspective on Danish into the conversation in various playful ways characterized by an exploration of the symbolic possibilities of language that often breach conventional meaning and form. Her playfulness throughout the interaction makes it possible for her to resignify a potential 'cannot' position, a position she seems well aware of, to a subject position in which she is audible and worth listening to as simultaneously an amusing peer, a serious student, and a guide into a pre-sexual universe. The positioning takes active effort from Tora who explicitly invites the other children to explore the phonetic and semantic aspects of language with her. Her consistent efforts develop into an exuberant interaction where all three children playfully involve themselves in manipulating and exploring the aesthetic and creative potentials of language and thereby generating a space in which they simultaneously examine the text universe, the possibilities of language to not just act on the world as it is but also to create new realities, and their own social identities as children on their way to becoming young people.

In the interactional process, a universe populated with males, females, hair and hormones arises and gives meaning to the text, thus triggering a transformative reading process shaped by and shaping the children's emergent interest. This is evident when the theme of the text, the vocabulary, and the rhymic and rhythmic parallelisms become interwoven with their corresponding interest in the attraction of girls and boys in the human world. It functions as catalysts for the creation of imaginary worlds where children can marry, where water is gendered, and where copepods have human characteristics. So, while we find Kress' sign maker perspective useful for understanding the children's transformative investment processes in reading, we suggest that the notion of *interest* benefits from a reconceptualization: Rather than something that

is acted out in a given context, interest is a phenomenon that emerges and develops in interaction and *contributes to shaping* the learning space.

Thus, we argue that a detailed focus on children's signifying practices that includes the interactional development of interest can broaden our understanding of language play and its transformative potential in children's interaction with texts, with each other and with the surrounding space. Such a focus could feed into discussions in applied linguistics about the role of language play in language and literacy learning.

REFERENCES

- Baker, R. S., A. T. Corbett, K. R. Koedinger, and A. Z. Wagner.** 2004. 'Off-task behavior in the cognitive tutor classroom: When students "game the system"' in E. Dykstra-Erickson and M. Tscheligi (eds): *Proceedings of the ACM Conference on Human Factors in Computing Systems*. ACM, pp. 383-390.
- Bell, N. D.** 2005. 'Exploring L2 language play as an aid to SLL: A case study of humour in NS-NNS interaction.' *Applied Linguistics* 26/2: 192-218. doi: 10.1093/applin/amh043.
- Belz, J. A.** 2002. 'Second language play as a representation of the multicompetent self in foreign language study.' *Journal of Language, Identity, and Education* 1/1: 13-39. doi:10.1207/S15327701JLIE0101_3.
- Broner, M. A. and E. Tarone.** 2001. 'Is it fun? Language play in a fifth-grade Spanish immersion classroom.' *The Modern Language Journal* 85/2: 363-379. doi: 10.1111/0026-7902.00114.
- Buchardt, M. and H. P. Laursen.** 2013. 'Et skridt ind i en ny verden': en kritisk læsning af Cooperative Learning ['A step into a new world': a critical reading of Cooperative learning]. *Unge Pædagoger* 1: 44-52.
- Bushnell, C.** 2008. "'Lego my keego!": An analysis of language play in a beginning Japanese as a foreign language classroom.' *Applied Linguistics* 30/1: 49-69. doi:10.1093/applin/amn033.
- Carroll, J. B.** 1963. 'A model of school learning.' *Teachers College Record* 64/8: 723-733.
- Cekaite, A. and K. Aronsson.** 2005. 'Language play, a collaborative resource in children's L2 learning.' *Applied Linguistics* 26/2: 169-191. doi:10.1093/applin/amh042.
- Cook, G.** 2000. *Language Play. Language Learning*. Oxford University Press.
- Daugaard, L. M. and H. P. Laursen.** 2012. 'Multilingual classrooms as sites of negotiations of language and literacy' in A. Pietikänen-Huhta and L. Holm (eds): *Literacy Practices in Transition*. Multilingual Matters, pp. 111-129.
- Forman, R.** 2011. 'Humorous language play in a Thai EFL classroom.' *Applied Linguistics* 32/5: 541-565. doi:10.1093/applin/amr022
- Iddings, A.C.D. and S.G. McCafferty.** 2007. 'Carnival in a Mainstream Kindergarten Classroom: A Bakhtian Analysis of Second Language Learners' Off-Task Behaviors.' *The Modern Language Journal* 91/i: 31-44. doi:10.1111/j.1540-4781.2007.00508.x

- Kagan, S.** 1992. *Cooperative Learning*. Kagan Cooperative Learning.
- Kagan, S.** and **J. Stenlev.** 2010. *Cooperative Learning. Undervisning med samarbejdsformer* [Cooperative learning. Teaching with cooperative structures]. Alinea.
- Kamberelis, G.** 2001. 'Producing Heteroglossic Classroom (Micro)cultures Through Hybrid Discourse Practices.' *Linguistics and Education* 12/1: 85-125. doi:10.1016/S0898-5898(00)00044-9
- Kolstrup, K. L.** 2015. *Opportunities to Speak. A Qualitative Study of a Second Language in Use*. PhD dissertation. University of Groningen.
- Kress, G.** 1993. 'Against arbitrariness: The social production of the sign as a foundational issue in critical discourse analysis.' *Discourse & Society* 4/2: 169-191. doi:10.1177/0957926593004002003
- Kress, G.** 2001. "'You've just got to learn how to see": Curriculum subjects, young people and schooled engagement with the world.' *Linguistics and Education* 11/4: 401-415. doi:10.1016/S0898-5898(00)00030-9
- Kramsch, C.** 2009. *The Multilingual Subject*. Oxford University Press.
- Laursen, H. P.** 2013a. 'Umbrellas and angels standing straight – A social semiotic perspective on multilingual children's literacy.' *Journal of Bilingual Education and Bilingualism* 16/6: 690-706. DOI:10.1080/13670050.2012.709818
- Laursen, H. P.** (ed). 2013b. *Literacy og sproglig diversitet* [Literacy and linguistic diversity]. Aarhus Universitetsforlag.
- Laursen, H. L.** and **L. Fabrin.** 2013. 'Children investing in literacy.' *Linguistics and Education* 24: 441-453. doi:10.1016/j.linged.2013.04.003
- Laursen, H. P.** and **N. D. Mogensen.** 2016a. 'Language competence in movement: a child's perspective.' *International Journal of Multilingualism* 13/1: 74-91. doi:10.1080/14790718.2015.1023308
- Laursen, H. P.** and **N. D. Mogensen.** 2016b. 'Timespacing competence. Multilingual children's linguistic worlds.' *Social Semiotics*. doi:10.1080/10350330.2015.1137163
- Long, M.** 1983. 'Native speaker/non-native speaker conversation and negotiation of comprehensible input.' *Applied Linguistics* 4/2: 126-141. doi: 10.1093/applin/4.2.126

- Long, M. and P. Robinson.** 1998. 'Focus on form: theory, research and practice' in C. Doughty and J. Williams (eds): *Focus on Form in Classroom Second Language Acquisition*. Cambridge University Press, pp. 15-41.
- Maybin, J.** 2007. 'Literacy Under and Over the Desk: Oppositions and Heterogeneity.' *Language and Education* 21/6: 515-530. doi:10.2167/le720.0
- Miller, J.** 1999. 'Becoming audible: Social identity and second language use.' *Journal of Intercultural Studies* 20/2: 149-165. doi:10.1080/07256868.1999.9963477
- Norton, B.** 2000. *Identity and Language Learning: Gender, Ethnicity and Educational Change*. Pearson Education Limited.
- Pavlenko, A. and A. Blackledge** (eds). 2004. *Negotiation of Identities in Multilingual Contexts*. Multilingual Matters.
- Pomerantz, A. and N. D. Bell.** 2011. 'Humor as safe house in the foreign language classroom.' *The Modern Language Journal* 95: 148-161. doi:10.1111/j.1540-4781.2011.01274.x
- Rowe, J. P., S. W. McQuiggan, J. L. Robison, and J. C. Lester.** 2009. 'Off-task behavior in narrative-centered learning environments' in S. Craig and D. Dicheva (eds): *Proceedings of the 14th International Conference on Artificial Intelligence in Education*. Springer-Verlag, pp. 99-106.
- Stenlev, J.** 2003. 'Cooperative learning i fremmedsprogsundervisningen [Cooperative Learning in the foreign language classroom].' *Sprogforum* 25: 33-42.
- Tarone, E.** 2000. 'Getting serious about language play: Language play, interlanguage variation and second language acquisition' in B. Swirzbin, F. Morris, M. E. Anderson, C. A. Klee and E. Tarone (eds): *Social and Cognitive Factors in Second language Acquisition. Selected Proceedings of the 1999 Second Language Research Forum*. Somerville: Cascadilla Press, pp. 31-54.
- ten Have, P.** 2007. *Doing conversation analysis*. Sage Publications.

APPENDIX 1

Transcription conventions

Inspired by the conventions developed in Conversation Analysis (see ten Have 2007)

[	A single left bracket indicates the point of overlap onset.
(.)	Pause shorter than 0.2 seconds.
(1.2)	Pause length in seconds. Between line pauses are indicated when (0.5) or longer.
<u>word</u>	Underscoring indicates stress.
°words°	Utterances bracketed by degree signs indicates relatively quieter speech.
<words>	Right/left carets bracketing an utterance indicates speeding up.
>words<	Left/right carets bracketing an utterance indicates slowing down.
::	Colons indicate prolongation of the immediately prior sound. Multiple colons indicate more prolonged sound.
-	A dash indicates a cut-off.
?	A question mark indicates a rise in intonation.
↑	Arrow indicates a marked shift in higher pitch in the syllable immediately following the arrow.
@@	At-sign indicates laughter. Multiple at-signs indicate more laughter.
(I think)	Utterances bracketed by parentheses indicate dubious hearings.
()	Empty parentheses indicate the transcriber's inability to hear what was said.
*	Asterisk indicates the following "word" breeches conventional Danish spelling, grammar or lexicon.
((comment))	Italics in double parentheses contain transcriber's comments.

APPENDIX 2:

Source: <http://ipaper.ipapercms.dk/DSB/udogse/2013/Juni2013/?Page=12>

► Forskning tæt på

Havets usynlige liv

Der er bagholdsangreb og kærlighed på spil i havets mikroskopiske verden

SIDEN nationalforfatteren H.C. Andersen nog vanddråben under lup i et af sine eventyr, har man fundet ud af, at det mikroskopiske liv i havet følger et sæt spille-regler, som minder meget om dem, der hersker i vores liv på landjorden. For det hele handler i bund og grund om tre ting: At spise, overleve og formere sig.

For at blive klogere på det undersøiske samfund har forskere fra Centre for Ocean Life med professor Thomas Kjørboe fra DTU Aqua i spidsen studeret vandløppen, som knap nok kan ses med det blotte øje.

Vandløppen har hverken syn eller

hørelse, men på trods af det kan den registrere sit bytte og udføre verdens hurtigste bagholdsangreb. Det er imponerende. For med en undselig størrelse på under en millimeter vil vandet føles som tyk sirup. Forskerne kalder det for Lucky

► **Et fingerbøl med havvand indeholder cirka en million bakterier, ti millioner virus og tusind algeceller af forskelligt ophav**

Luke-effekten, fordi det minder om tegneseriehelten, der er hurtigere end sin egen skygge.

Forskerne har også opdaget, at vandløpperne har et avanceret kærlighedsliv. Men

hvordan bærer en blind vandløppe af hanken sig ad med at finde en partner i det store ocean? Tricket er

enkelt. Hunvandløppen frigiver en duft af kærlighedshormoner – såkaldte feromoner – og hanvandløppen vil minutøst følge sporet.

De danske forskere er på jagt efter de kærlighedshormoner, som hunnerne bruger til at tiltrække og hypnotisere hannerne. De har nu fundet 50 mulige kandidater. Hvis det lykkes at isolere et kærlighedshormon, vil det kunne bruges til at 'fjernstyre' hanvandløppers adfærd. Det kan blive en fordel i havbrug, hvor vandløpper bliver brugt som foder til fiskelarver.

'Det ser næsten ud som en helt tallerken fuld af rejer, der springer mellem hverandre, og de er så glubende, de river arme og ben, ender og kanter af hverandre, og dog er de glade og fornøjede på deres måde', som H.C. Andersen skrev det. ◀◀

FRA H.C. ANDERSENS 'VANDDRÅBEN'

'Du kender da sagtens et forstørrelsesglas, sådan et rundt brilleglas, der gør alting hundrede gange større, end det er? Når man tager og holder det for øjet og ser på en vanddråbe ude fra dammen, så ser man over tusinde underlige dyr, som man ellers aldrig ser i vandet, men de er der, og det er virkeligt'.

TEKST LASSE FOGHSGAARD, EXPERIMENTARIUM

APPENDIX 3

The children's individual notes.

<p>vandløpper H.C. Andersen Stikord ★</p> <p>huvandløpper tiltrækker en duft-hormon til hævandløpper</p>	<p>Nanna T. copepods H.C. Andersen Keywords</p> <p>Female copepods attract *an odor *homone to male copepods</p>
<p>• vandløpper • H.C. Andersen Stikord</p> <p>Hvis man ser på vanddråber med en mikroskop eller forstørrelsesglas kan man se millioner små vandløpper/bakterier</p>	<p>Nujalina • copepods • H.C. Andersen Keywords</p> <p>If one looks at water drops with *a microscope or a magnifying glass one can see millions of small copepods/ bacteria</p>
<p>*SP's, overlev og formere sig. *100 liter vand stor del af de vand insekter. *H.C. Andersen. *mange kærlighed hormoner. *der mere end det vi kan se. *i et vand drop er der tusende bakterier? *</p>	<p>❖ Eat, *survive and breed ❖ 100 liters of water large part of those water *insects ❖ H.C. Andersen ❖ lots of *love hormones ❖ there more than what we can see ❖ in *a water drop there are *thousands *bacteria?</p> <p>((Tora's notes))</p>

APPENDIX 4

Outline of the recording

Phases	Time interval	Content
Intro	0:00-4:30	The research assistant introduces the activity
Phase 1	4:30-9:30	Reading of the text
	9:30-14:00	Individual note-taking
	14:00-21:30	Reading of the text
	21:30-24:00	Individual note-taking
Bridge	24:30-27:15	The research assistant prepares the children for phase 2. The children decide to read aloud their notes for each other.
Phase 2	27:15-47:30	(See the analyses)
Phase 3	47:30-01.00:10	The research assistant rejoins the children. She asks their opinion on the original text, their own text, the theme, the activity.