Where do my words come from?
Towards methods for analyzing word choice in primary level writing

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Few intellectual tools exist for characterizing word choice development in primary level writing. The aim of this study was to identify categories for describing the development of word choice in young children's narrative writings. Such categories may be used to demonstrate how word choice develops within writing practices of primary classrooms. The analysis was based on thirty texts from six students studying Norwegian as a first-language and collected from mid-year second grade through fourth grade utilizing case-study methodology. In the students' classroom, considerable emphasis was put on using literature to establish an intertextual basis for student learning. The students' texts were scored by a group of teachers using a rubric specifically designed for word choice to analyze verbs and adjectives, lexical individuality, and lexical diversity, as additions to the more traditional word counts. These categories were discussed, and many were found fruitful for tracing intertextual understandings and describing word choice development. However, the category of lexical individuality may be too conservatively defined to capture important developments among this age group.

Keywords: primary writing, word choice, lexical features, intertextuality

1 Introduction

Few analytical tools exist for characterizing word choice (vocabulary) development in primary level writing. Current research on the scoring of student texts following an intervention has provided new information on the *scoring* of word choice (Berge & Skar, 2015; Coe, Hanita, Nishioka, & Smiley, 2011; Jarmer, Kozol, Nelson, & Salsberry, 2000), but there is little research describing *how* student texts actually change over an extended period of time. Word choice is, furthermore, an area without well-established terminologies among teachers at primary grades (Matre et al., 2012).

The aim of this study was to identify categories for describing the development of word choice in young children's narrative writings. Such categories may be used to demonstrate *how* word choice develops within writing practices of primary classrooms. In this study, the specific aim was to investigate potential

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analytical tools to describe the breadth and depth of word choice in student texts over a two-year period and to evaluate if any of these analytical tools could be useful in tracking students' word choice development.

The presented study is part of a larger intervention study with the main hypothesis that active use of a shared terminology will assist teachers in their efforts to enhance student writing development in a primary-school setting. To test this hypothesis an intervention study was designed involving professional development sessions with teachers over two years. These sessions introduced and negotiated a shared metalinguistic terminology and strategically planned how to contextualize the shared terminology in dialogue with the teachers. The findings provide indicators for the use of the shared terminology and for how the terminology was successfully embedded in teaching and learning practices in the classrooms (Kristoffersen, 2018). This article aims to provide insight into *how* word choice develops within writing practices of primary students, supported by defined writing dimensions[1], analytical tools and a derived rubric (see Figure 1).

In this study the derived rubric was helpful in defining word choice (see Figure 1). The word choice rubric was divided into four areas (A, B, C, D) where an effort was made to focus on different aspects within word choice to create clearer expectations and attempt to define an otherwise 'fuzzy' concept. The first focus (A) was on *precision that leads to understanding* of the writing as it was meant to be conveyed by the writer. Secondly, (B) indicates to what level the words and phrases were *well-chosen and can maintain the reader's attention*. Thirdly, (C) the *words were aligned with the purpose for writing*. Finally, (D) *verbs, nouns, adjectives and adverbs were varied and provide depth*. Within the rubric the four areas were defined at three different levels (II, III, IV), therefore, it was possible to compare the four areas between the three levels as a guide to further understand how word choice was used.

The term 'word choice' is used in this article as synonymous with diction. Diction is defined as precision and appropriateness of the words and expressions for the writing task. This definition of diction is taken from the Analytic Writing Continuum (AWC) (Swain & LeMahieu, 2012). AWC was developed as an assessment system appropriate for providing data to teachers and to evaluate the National Writing Project professional development program (Swain & LeMahieu, 2012). Originally, the AWC was based on the six traits writing model developed by Culham (2005) and Spandel (2009) which uses the term word choice instead of diction. 'Six-trait writing' was developed by a group of teachers as an approach to classroom assessment of student writing that would provide students and teachers with more structure to understand how to write well (based on the descriptive and theoretical work of Diederich [1974] and Purves [1988]). I choose to call these traits dimensions within this study. The term word choice was used between teachers and students to build a shared terminology in the teaching and learning of literacy practices while diction was also used in the professional development sessions to address the dimension in a more comprehensive manner.

The terms word choice and vocabulary are not synonymous. Word choice refers to the choice and use of words in writing or speech whereas vocabulary refers to the body of words known to an individual person. There is substantial research on the importance of vocabulary for second language learners (L2) and some (but seemingly less research) for first language learners. This body of research often

studies receptive and\or productive vocabulary. Laufer (1998) subdivided productive vocabulary knowledge into controlled and free productive knowledge. Controlled productive knowledge indicates an ability to produce words when a cue is given and free productive knowledge refers to the spontaneous use of a word without any specific prompts for a particular word, as in the case of free composition. In a review article by Schmitt (2008), a conclusion based on numerous studies showed that productive mastery cannot be assumed to follow from receptive mastery of words. In fact, it seems that if productive mastery is required then learners need to engage in productive tasks for this to be developed. Two separate studies with L2 learners (Lee, 2003; Lee & Muncie, 2006) found that structured productive practice assisted higher levels of productive mastery. Similar findings have also been reported in studies looking at oral productive use (see e.g. Ma et al., 2017). Most of the research on vocabulary instruction is based upon tests of receptive knowledge of words. There was not only limited research referring to word choice or diction in primary students but also in the area of free productive use of vocabulary. No examples of written tasks for primary age children were found that fit the definition of a free productive composition studying the growth of vocabulary.

Paquette (2007) and Collopy (2008) explored explicitly using six dimensions of writing (Culham, 2005; Spandel, 2009). The six dimensions were used in combination with children's literature to support language learners in expanding their discourse competence. The six dimensions of writing provided a framework for working with an instructional focus on intertextuality. Intertextuality was understood as one literature-based strategy in teaching writing where students explore the language in literary fiction and borrow rhetorical and linguistic patterns to build meaning in their own writing (Jesson, McNaughton, & Parr, 2011).

While searching for possible analytical tools for studying word choice among young L1 writers, this study also attempted to find possible traces of intertextual understandings. For young writers, experimenting with rhetorical and linguistic patterns in academic registers can be a challenging task. While some research recommends the practices of using literature-based strategies to improve writing (Graham & Perin, 2007), this study adds to the few studies that have explored how explicit teaching of the highly patterned language in children's literature promotes awareness of language as a repertoire of choices (Corden, 2007; Harman, 2013; Jesson et al., 2011).

Based on previous research, the focus here was on a set of breadth and depth measures to attempt to locate analytical tools to study developments within word choice. The breadth of word choice depends on surface level linguistic features such as lexical diversity (LD) and lexical individuality. In this article the breadth of word choice is define by measures that in some way can *count* linguistic features within a text. Lexical diversity is one aspect of 'lexical richness' and was calculated using the Measure of Textual Lexical Diversity (MTLD) which is the mean length of sequential word strings in a text that maintain a given Type/Token Ratio (TTR) value. This measure is sensitive to text length while using all the segments within the text. Lexical diversity is one important indicator for word choice because it can be used to measure vocabulary knowledge and has also been found to be an indicator of writing quality among older students (Malvern, Richards, Chipere, & Duran, 2004; McCarthy & Jarvis, 2010).

A high LD score indicates little repetition of lexical words. Lexical diversity (LD), the type/token ratio of the lexical words in each composition, may also indicate developmental *patterns* among student writers. Olinghouse and Wilson (2013) studied LD across three genres (story, persuasive and informative) where LD was a unique predictor of writing quality within the genre narrative writing. Lexical diversity should not, however, stand alone as a developmental indicator of a writer. For instance, lexical repetition may be used for stylistic purposes within a piece of writing. On the other hand, LD could signal, for example, that a student was beyond the practice of overusing adjectives and was beginning to be selective about word choice. Lastly, it adds to the discussion of whether text length could be a sole indicator of a *quality* text without other measures (Linnarud, 1986). While there is wide agreement among researchers that text length is an indicator of writing fluency, text length alone *cannot* predict the qualities of the text which contribute to creating a high-quality text. Since text length has repeatedly been used as an indicator of successful writing, the total word count (WC) was provided for each student.

Lexical individuality measures the proportion of words unique to that writer, in the *entire* corpus of texts as defined by Linnarud (1986). Lexical individuality is thus an indicator of originality for each student (Linnarud, 1986) However, with young writers this definition of individuality proved too narrow to produce any results that were useful. In this study, lexical individuality measured adjectives and verbs used *only once* by the student within a piece of writing and may give an indication of the use of a variety of words beyond those which are often overused in the early years of narrative writing.

This study of early writers focused on verbs and adjectives due to the emphasis teachers traditionally have had on adding adjectives and varying verb usage when beginning to address word choice. Additionally, the organization in sentences often focuses around the verb, particularly, in these early years. Trainin, Andrzejczak and Poldberg (2006) made a similar decision and focused on illustrative verbs and adjectives. In addition to a few other traits they studied verbs and adjectives in writing and visual arts for second to fourth graders with the justification that young writers tend to use short familiar words and simple sentences. Therefore, the choice to focus on adjectives and verbs was based on current practices that seemed to be common practice in primary education and on the current practices of the teachers involved in this research project. In addition, the choice was supported by a relevant previous research project (Trainin et al., 2006).

The category of adjectives provided an interesting window on lexical development. Adjectives constitute a less primary lexical category than nouns in many ways. Nouns refer, describe, or designate objects in some way. Adjectives, on the other hand, denote attributes or properties of nouns (Lyons, 1968). Therefore, since adjectives are less robust and canonical than nouns, the distribution and status of adjectives should be an indicator of lexical acquisition that may be hidden in the developmental paths of the more canonical lexical classes. The size and makeup of the adjective category can thus be taken to constitute one yardstick for language 'richness' (Berman, 2004; Ravid & Berman, 2009). Adjectives were also relevant in the context of the narrative genre since the focus was on people-related events and motivations.

The depth of word choice features is used in this study in an attempt to trace observable intertextual practices. Jesson et al. (2011) had an explicit focus on the

intertextual relationships between texts and searched for the potential to transfer textual knowledge. Intertextual practices were observed and set in four categories in the Jesson et al. study (2011) where three of these categories were relevant for the data set in this study: encouraging students to borrow author's techniques, classroom strategies used when writing, and the use of multiple texts. Borrowing in one way was demonstrating the merging of dimensions across utterances as one notion of intertextuality. This borrowing has occurred through spoken and written utterances which have been interpreted by the students as meaningful and functional examples within the writing task. While spoken utterances have been observed, they have not been specifically studied in this research; the focus was on the written utterances within the student texts.

The motivation for this study was to specifically locate analytical tools to search for transfer and expansion of intertextual relationships and a common terminology specific to word choice. The research questions that were posed in the study are:

1) To what extent may analyses of adjectives and verbs (including lexical individuality) provide additional information in describing word choice development in student texts?
2) What, if any, traces were observable of intertextual practices?

2 Methods

2.1 Research design

This study has a case-study design with five texts being written in a L1 Norwegian class over a period of twenty-six months (from mid-year second grade (age 7) through fourth grade (age 9)). The pre- and post-intervention texts had similar narrative prompts regarding a dream vacation and will be referred to in the following manner throughout the article: pre-intervention dream vacation (Pre-DV) and post-intervention dream vacation (Post-DV). The Pre-DV and Post-DV were written as on-demand writing prompts during one class writing session lasting no more than ninety minutes. Three additional narrative texts were written using the following children's literature in L1 Norwegian class as an instructional tool: modern fiction *Horrid Henry* (Rampete Robin) by Francesca Simon (referred to as mod-fiction text); a fractured fairytale[2] *The Three Billy Goats Gruff Go to the Waterpark (Bukkene bruse går til badeland)* by Bjørn F. Rørvik (referred to as fairytale text); and a variety of fables such as *The Chimpanzee and the Camel; The Father, the Son and the Donkey; The Lion and the Mouse; The Hare and the Turtle; The Ant and the Pigeon* (referred to as fable text).

2.2 Site and participants

The data reported here was from Guro[3], the focal teacher who developed her approach through participation in professional development. During monthly two-hour professional development sessions with a team of six teachers from 2011–2013 at Malund School. In this professional development initiative, the focus was building academic literacy using the six dimensions (word choice, voice, sentence fluency, ideas, organization, and conventions) framework. This terminology was central in attempting to provide an explicit framework for

teaching using literature-based instruction to support the students and create intertextual connections.

Malund School is one of the largest primary schools in Norway with approximately 100 students per grade level. At Malund teachers worked in pairs with approximately thirty-five students in each room. All the teachers and students within this grade level participated in the professional development and writing tasks within the study. Student work was on display in the room showcasing authentic writing (for example comic strips, books, posters, brochures). The students crafted posters in each classroom to create meaning with regards to the six dimensions used in writing.

The case study centered on a sample of six students chosen out of the class writing in the subject of Norwegian. The teacher indicated Vera and Inga as strong writers, Julia and Tobias as average writers, and Kjell and Viggo as challenged writers at the outset of the study. Julia as a representative of an average writer was the focus student. Julia frequently asked the teacher for assistance with her writing at the onset of the project period. She was a student who wanted to do well, but was uncertain of her writing abilities and needed support within her choices for writing.

2.3 Data collection

The data included five narrative texts from each of the six students (3 girls and 3 boys). In addition, the following data was collected: instructional materials, children's literature, professional development materials, and field notes.

The Pre-DV and Post-DV had similar narrative prompts regarding a dream vacation, both were written within one class period setting without assistance. The Pre-DV was written in January 2011, and the Post-DV was written in May 2013.

Three additional narrative texts (mod-fiction, fairytale, and fable) were written at the following times: mod-fiction March 2011, fairytale text in April 2012, fable text in February 2013. The mod-fiction, fairytale, and fable were taken to the publication stage. Taking a text to publication implied that students used process-oriented writing incorporating explicit use of intertextual features from the literature and 'published' the text within the classroom setting as a piece of authentic literature (book, brochure, etc.). Rubrics were introduced to students at the start of the writing project to set expectations and explicitly foster the use of literary devices and word choice. Rubrics were, therefore, not merely used for assessment but also as an instructional tool.

2.4 Analysis

Data analysis studied the depth and breadth of word choice. In this article the depth of word choice allowed me to search for intertextual practices that were observed *across* texts. Three intertextual practices were observed included borrowing authors' techniques for their own use; creating classroom strategies through reading texts with the purpose to be used in writing texts; and using multiple texts to build textual knowledge. The mod-fiction, fairytale, and fable texts were searched for traces of borrowing words or phrases within the student texts in conjunction with teacher instructional materials, professional development materials, and field notes.

The practice of teaching borrowing as a strategy allowed the teachers to explicitly encourage students to borrow the techniques of authors and to reuse those techniques to fit their texts appropriately. As Morrow (2005) notes, children's literature is a natural avenue for evaluating and motivating student writers, so in order to encourage the students to borrow authors' techniques, mod-fiction, fairytale and fable texts were used in class.

Using texts was the second intertextual teaching practice that was used inductively with students to create learning strategies or scaffolds for writing the texts used in this research. The following examples include charts, writing frames, posters defining the dimensions and providing examples from the students. First, students created charts of adjectives and verbs as continuums after reading through narrative texts providing synonyms based upon the speed of walking from least to greatest (i.e. the word *walk*, a list may contain: saunter, linger, stroll, walk, trek, hike, trot). Secondly, the students and teachers together created a writing frame using a portion of the fairytale focusing on aspects of plot such as: opening, setting, complication, climax, and resolution. The teachers specifically used sensory language to model ways to 'show, not tell' the students before going on to write their own fairytales. Thirdly, the students created a poster defining in their own words what word choice means including tips to have varied vocabulary in their text.

Finally, the teacher read children's literature aloud to the entire class and drew attention to specific structural or stylistic features. Teachers also used electronic whiteboards for shared writing. This procedure involved teachers and children working collaboratively to compose sentences or paragraphs using literacy techniques identified in the children's literature. The focus for one session might be literary devices such as metaphor. Yet another day the focus may be selecting words within different word classes (adjectives, verbs, nouns) by searching for words within children's literature or a student text.

In this article since the breadth of word choice was defined by measures that in some way *count* linguistic features within a text. It was important to investigate which software options increased the validity and reliability of LD analysis. The *Coh-Metrix* software (McNamara & Graesser, 2011) provides scores for WC and LD. Within LD, scores can be provided as TTR - content word lemmas, TTR - all words, MTLD, and vocd-D. In a validation study of MTLD and vocd-D by McCarthy and Jarvis (2010) the issue of text length weighed heavily. For this present study MTLD was used because texts written by primary students may be short in length and MTLD was a valid measure for texts with as few as one hundred words. The MTLD measure was omitted for students who submitted texts under this threshold.

The scoring of texts was done by a group of expert teachers. In this study, expert teachers had participated in professional development training for three and a half years and used the six dimensions in their own classroom setting. The teachers scored the texts in the same setting on the same day. The texts were each scored by two separate teachers and if the scores did not match, the text was sent to a third teacher. This group of four teachers scored the texts using a scale of five bands (Figure 1), a rubric, and benchmark papers. The rubric had outlined expectations for a score of 2, 3, and 4 on the scale. If the expectations were below a 2, the paper was scored a 1 and if the expectations of a 4 were exceeded, the paper was scored a 5. The rubric is presented in Figure 1 below.

Figure 1. Word Choice Rubric.

IV		**Words and phrases communicate meaning in a precise, natural and interesting manner.**

IV   **Words and phrases communicate meaning in a precise, natural and interesting manner.**
      The words are clear, engaging, and provide for colourful language.

A   Word choice is precise and clear. It is easy to understand exactly what the writer means to convey.

B   Well-chosen words and phrases grab the reader's attention and linger in the reader's memory.

C   The choice of words and phrases are aligned to the purpose of writing and the reader.

D   Lively verbs provide energy; at the same time, specific nouns and nuances in adjectives and adverbs add depth.

III   **Word choice makes the text easy to understand at a general level.**
      The word choice is functional even if it is not very colorful.

A   In general the word choice is appropriate and correct and the meaning within the text is not unclear.

B   Known words and phrases provide meaning but do not stimulate the reader's imagination.

C   The choice of words and phrases are at times appropriate to the purpose of the writing. However, at times the words are not attuned to the reader.

D   The text is loaded with everyday verbs and nouns. Common adjectives and adverbs are used occasionally. The words seem to be chosen by the first word that came into the writer's mind.

II   **The writer has a limited and general vocabulary and the text is not varied in terms of word choice.**

A   Word choice is so imprecise with little variation that the meaning in the text becomes unclear.

B   Words and phrases are used in a manner that can cause the reader to become confused. Many words and phrases are poorly chosen in the text.

C   Word choice is not adjusted for the purpose or the reader. Words and phrases can be misleading.

D   The wrong word diminishes the reader's understanding to a high degree.

3 Results

3.1 Depth of word choice

In this article searching for observable intertextual practices in the student texts which can be traced due to knowledge of the instructional practices that were modeled through the professional development was done in three ways to delve into the depth of word choice. These intertextual practices included borrowing authors' techniques; creating classroom strategies through reading texts with the purpose to be used in writing texts; and using multiple texts to build textual knowledge. The scope of this article allows for only a few examples in each of these areas with regards to word choice which will illustrate how an inductive approach was used with the students to encourage these intertextual practices.

The practice of borrowing can be used by students across genres in ways that may or may not be viewed as appropriate. The first example was found in the fairytale text. All the students decide to start the fairytale in an appropriate manner based upon the fairytale texts shared with the students.

Once upon a time there were three billy goats who were going out to graze and get nice and fat and all three were named the Billy Goats Gruff. (*Det var en gang tre bukker som skulle til seters å gjøre seg fete, og alle tre så het de bukkene Bruse. På veien var det en bro over en foss, og under den broen så bodde et stort, fælt troll.*)

An inappropriate example shows the fable from one out of the six students beginning as a stock phrase typically used at the beginning of fairy tales:

Once upon a time there was a wolf that went for a walk and it was cool and it was spring. (*Det var en gang en ulv som gikk en tur, og det var kjølig og det var vår.*)

Here is an additional stock phrase used by five out of six of the students to end the fairytale text:

'Snip, snap, snout, the tale is out.' (*Snipp snapp snute så var eventyret ute.*)

The remaining student decided to use a truncated version to end the fairytale which may signal an implied ending after being familiarized with fairytales or that the student had internalized a portion but not all of the stock ending:

'Snip, snap, snout!' (*Snipp snapp snute.*)

As reported by Guro, there were no examples of using the senses to aid in description within texts prior to the modeling done in class while the students wrote the fairytale texts. This first example contains a sentence from the pre-intervention text where the student *could* have chosen to include a sensory description instead of simply expressing that all was well and then, secondly, an example from the fairytale text where the same student started to employ descriptions that relied, in this case, on the sense of smell.

'Every morning I take a morning swim. It is so good.' (*Hver morgen tar jeg et morgenbad. Det er deilig.*)

'Then the captain says welcome to Titanic the boat that never sinks. Then it smells like oil and saltwater.' (*Så sier kapteinen velkommen til titanic båten som aldri synker. Så lukter de kirsolje og saltvann.*)

Here are two additional examples from two different students with the use of senses:

'smells like the sea' (*lukter sjø*)
'hear the waves that hit against the shore' (*hører bølgene som slår inn mot land.*)

Guro's class had not previously used children's literature directly tied to writing tasks. The first text used was *Horrid Henry*. Guro asked the children to listen to the text *Horrid Henry as* though they were the writer. In the next phase, the students were asked to continue writing the story with a new experience for Horrid Henry. While one text example was used and focused on with the fractured fairytale, there were several texts used as an example of a fable prior to writing the fable text. The students were also taught that a fable was a short story with a moral. In this study, the students produced shorter fable texts than fairytale texts.

All of the fractured fairytales had a twist. The following student example states the twist directly by first stating the traditional version, followed by the fractured

fairytale model text example, and ending the sentence with the twist in the student's own fairytale text.

> 'It was not the countryside, not the waterpark, but the amusement park!' (*Det var ikke setra, ikke badeland, men fornøyelsespark!*)

The other students in this study had a twist which involved going to the library, an ice-hockey hall, or a cruise ship (Titanic).

3.2 Breadth of word choice

Word count and MTLD scores were compared between the six students to track any parallel development (see Table 1). In two of the students (Julia and Tobias) parallel development seemed to take place, where the lowest WC also had the lowest LD score, and the scores continued in this pattern to the largest WC and LD scores. In the remaining four students there was one student, Viggo, whose highest WC corresponded to the highest LD count. Kjell's WC was under 100 on the Pre-DV and mod-fiction text, while WC varied from 112 to 401 in the final three texts; whereas, the LD was relatively stable ranging from 31.63 to 40.72. Two other students, Vera and Inga, had a less stable pattern where the discrepancies in WC and LD are described below.

Table 1. Word Count and Lexical Diversity.

	Pre-DV		Mod-Fiction		Fairytale		Fable		Post-DV	
	WC	LD	WC	LD	WC	LD	WC	LD	WC	LD
Inga	61	NA	132	42.01	550	60.55	463	72.97	270	60.09
Julia	119	31.00	81	NA	283	63.26	211	47.76	322	87.61
Kjell	45	NA	58	NA	373	40.72	112	31.63	401	37.21
Tobias	64	NA	131	40.00	387	57.79	184	49.31	149	41.59
Viggo	41	NA	91	NA	299	70.69	168	45.13	155	51.80
Vera	241	48.40	227	46.47	783	58.07	248	57.43	484	51.89

Key: WC-Word Count, LD- Lexical Diversity.

Inga's Pre-DV text (under one hundred words) allowed for no MTLD score; her mod-fiction text was 132 words with a score of 42.01. There was dramatic growth in the fairytale text, not only in WC, but also in the LD score, that increased to 60.55. While the text length decreased to 463 words in the fable text, the LD increased, to 72.97, and in the Post-DV text the LD score returned to 60,09, even if the number of words was only 270.

Vera's Pre-DV and mod-fiction were in the 200-word range, and the LD was in the mid to upper 40 range. The fairytale text more than tripled in length, and the LD was 58.07. Moving to the fable text the length decreased to 248 words; however, the LD remained stable. In the Post-DV text, Vera wrote nearly twice as many words, and the LD score dropped, but continued to be in the 50 range. In summary, Vera's LD scores rose markedly in the fairytale text, and she was able to maintain the LD score in the fable text despite the decrease in WC. A similar pattern was seen when comparing Inga's fairytale and Post-DV texts, where the WC was nearly halved in the Post-DV text, but the LD scores were stable. It seems that LD may in some cases remain high even if the WC declines.

When comparing the verbs in the Pre-DV and Post-DV texts, three of the students showed nearly twice as many verbs used once within each text, with the following ranges from the Pre-DV to the Post-DV text 4–7, 7–16, 4–19. This last example illustrated over four times as many individual verbs. The three remaining students showed a marked increase in verb individuality within the mod-fiction, fairytale and fable texts.

Few aspects were shared by the six students in terms of verb individuality (see Table 2). In five out of the six texts the largest verb individuality was found in writing of the fairytale texts, where all of these texts were also the longest. In four out of six texts the LD score was also the highest in the fairytale texts, but in one case the score was only minimally higher than that of the fable text score (Vera - Fairytale: 58.06; Fable: 57.43).

Table 2. Verb Usage.

	Pre-DV VI/NS	Mod-Fiction VI/NS	Fairytale VI/NS	Fable VI/NS	Post-DV VI/NS
Inga	4/7	14/17	25/60	22/46	7/24
Julia	4/13	13/7	21/32	11/20	19/15
Kjell	7/7	7/9	9/60	9/16	16/36
Tobias	6/8	16/13	21/52	14/25	4/12
Viggo	7/8	9/13	25/32	20/17	8/19
Vera	12/16	15/31	25/104	16/39	15/65

Key: VI-Verb Individuality, NS-Number of Sentences.

Without exception, all the texts more than doubled in adjective individuality from the second to the third text, and three students moved from single to double-digit numbers in terms of adjective individuality (see Table 3). In five out of the six students the number of adjectives changed dramatically. The range in the number of adjectives in the second text was 1-8 while the range in the third text was 22-61 adjectives.

Table 3. Adjective Use.

	Pre-DV Adj/WC IND		Mod-Fiction Adj/WC IND		Fairytale Adj/WC IND		Fable Adj/WC IND		Post-DV Adj/WC IND	
Inga	4/61	4	4/132	2	43/550	22	23/463	9	22/270	10
Julia	6/119	4	4/81	2	9/283	7	8/211	8	41/322	26
Kjell	0/45	0	1/58	1	24/373	5	5/112	5	4/401	4
Tobias	3/64	3	7/131	2	22/387	10	9/184	9	4/149	4
Viggo	1/41	1	6/91	3	22/299	8	10/168	8	7/155	7
Vera	8/241	6	8/227	3	61/783	26	17/248	7	35/484	13

Key: Adj-Adjective; WC-Word Count; IND- Individuality of Adjectives.

The fairytale to the fable text examples displayed that in four of the texts the number of adjectives was at least halved, and one additional text decreased from 43 adjectives in the third writing sample to 23 adjectives in the fourth. It was important to also note text length as all the fable texts were shorter. Two of the texts were about twenty-five percent less, with two of the texts being just above

half the length of the fairytale text and two remaining texts being well under half the length of the fairytale text.

Quite a difference in text length was found from the fourth to the fifth text. Taking text length into consideration, two students used fewer adjectives in the final writing prompt, two students were constant, and two students continued to use a greater number of adjectives. It was interesting to note not only the changes from the fable to the Post-DV text, but also how initial and final texts differ. In five out of six students' adjective usage more than tripled from first to last text samples, with the range being from 0-9 in the first text to a range of 4-41 in the final text.

The texts were scored based upon word choice by an expert teacher panel using a rubric. The scores varied greatly among the students. Kjell's texts were scored as a three across all five texts (it could be noted that one rater scored his first text as a two and the fable text as a four). Victor and Tobias had similar scores with the Pre-DV and mod-fiction being a three and the fairy tale, fable, and Post-DV rated a four. Julia scored three on the Pre-DV, mod-fiction, and fairytale texts while scoring a four on the fable text and a five on the Post-DV text. The last two students had scores that peaked. Inga started with a score of three on the Pre-DV and the mod-fiction text, increased to a five on the fairytale text, and then declined to a four on the fable and Post-DV texts. Vera was the only student to score a four on the Pre-DV and mod-fiction texts. She then increased to score a five on the fairytale text, dropped to a three on the fable text, and ended with a five on the Post-DV text.

3.3 Julia: a focus student

Julia, the focus student, overall, represents a student who increasingly improves from a score of 3 to a score of 5 with the student writing rated specifically with regards to word choice and rated three times. Julia's Pre-DV was rated as a three, mod-fiction text was rated as a three, fairytale text was rated as a three, fable text was rated as a four, and Post-DV text as a five. The scores do not coincide with WC and or LD in all cases. The fable text had a lower WC and LD score but was rated as a 4 by the scorers.

Possible depth measures shown by Julia from the Pre-DV text to the Post-DV text illustrate possible traces to the instructional practices in the work done with word continuums and\or raising awareness for a variety of words and illustrate 'show don't tell' as Julia uses words\phrases such as: *'elegant,' 'gigantic,' 'shines like gold,'* and *'bubbles that make different sounds when they pop'* in the Post-DV text.

When taking a closer look at the number of sentences, verbs and adjectives the following changes were worthy to note from Julia's texts. Julia's verb choices became more varied throughout the five texts. In the Pre-DV text containing thirteen sentences, she only used four different verbs; whereas in the mod-fiction text, she averaged nearly two verbs per sentence, which were unique to the story. The fairytale text contained the most sentences and had twenty-one unique verbs. While it appears that the fable text declines in verb individuality, it, in fact, stayed quite close to the same level of verb individuality considering the text was quite a bit shorter and there were fewer sentences. The final text had a much higher verb individuality than the previous texts when taking into consideration the text length and the number of sentences in relation to the verb individuality.

Julia gradually increased her use of adjectives up through the Post-DV text where she used forty-one adjectives of which 26 were different adjectives. Prior to the Post-DV text the adjective usage was in the single digits.

4 Discussion

This study aimed to locate analytical tools for use in text research with young students. The following research questions were formulated: First, what, if any, traces were observable of intertextual practices? Secondly, to what extent may analyses of adjectives and verbs (including lexical individuality) provide additional information in describing word choice development in student texts?

There were few studies found that attempt to monitor the word choice development over time as in this case study while there were numerous other studies existing addressing vocabulary and more specifically vocabulary for L2. The study by Dabbagh and Enayat (2017) confirmed the importance of vocabulary breadth (especially within the band of up to 3000 words) while the depth of vocabulary was correlated but not predictive of L2 performance in descriptive writing. While the study by Dabbagh and Enayat (2017) investigated the connection between vocabulary and descriptive writing it did not provide any insight into how the *teaching* of word choice may influence writing.

While future studies are needed to thoroughly test the analytical tools to study the depth of word choice, the analysis presented here found three potential ways of exploring intertextuality. First, there were examples of borrowing the patterns in which adjectives were used in several texts (for example: *the smallest goat* (*minste bukken*)). Secondly, word choice was part of a shared terminology to raise students' awareness of the vocabulary used in their writing. Julia, the focus student, began to go beyond the most commonly used adjectives and became more descriptive with her words. She went from using common adjectives to using adjectives such as '*gigantic, elegant, and silky*' and using words that create a picture for the reader such as '*the bubbles all made different sounds as they broke*' and '*there was so much sun that we had to use 100 bottles of sunscreen.*' This study focused on verbs and adjectives where changes were clearly documented. Future studies could possibly assist in *what teaching practices* afford transfer of effective usage within adjectives and verbs related to intertextuality.

Finally, within the narrative genre, the texts of fairytales and fables produced very different results in terms of text length even though the fable text was written much later than the fairytale text. This could be due to Guro's text expectations since a fable was a short text with a moral. Taking this into consideration it was noteworthy that the LD was higher in most cases for the fable text. It was worth mentioning that intertextual practices trace back to strategies used within the teaching of the fairytale text. These traces were less apparent in the fable text. The fairytale text used an explicit text example; whereas, the fable text used a variety of fables as text examples. The student fairytale texts seemed to often used borrowing as a strategy. The three text samples (mod-fiction, fairytale, and fable) brought out interesting results in terms of increased discourse competencies. First, the teacher gave insight into how the teaching and modeling of writing took place including the differences in the rubric used for the fairytale and the fable texts. The fairytale text offered a clear organizational structure, which seemed to appeal to the children's imagination. Within the fairytale texts, there were clear examples of students borrowing techniques from the author and then reshaping them to fit the students' needs based not only on the words chosen but also the structure of the texts. An additional factor could also be that the structure and conventions of a fairytale were more familiar to children in general.

Within the breadth of word choice, the most evident change found was the increase of adjective individuality from the second text to the third text. Adjective individuality does not in itself indicate the quality of a piece of writing (nor does the number of adjectives). However, to monitor young writers *for* a variety of adjectives and *how* the adjective individuality changes over time could be an indicator to monitor development. Therefore, adjective individuality may be monitored to observe the variety of usage of adjectives, which in turn could guide instruction.

Not only did adjective individuality increase across all texts; the overall number of adjectives increased. It was possible that students at times overused adjectives, but overuse may at certain stages be a sign of ongoing development (Evensen, 1993). The borrowing of the structure of adjective use occurred within the students' writings. For example, this was seen in the names students selected such as *Strong Ulrik* after reading the mod-fiction text.

This study included the individuality of verbs and two restrictions should be specified. First, while the category of verb individuality may be an indicator of growth, it does not capture successful multiple verb usage. For example, one student had a low verb individuality score, but the list of verbs used twice was extensive. Repetition can be an effective strategy within learning and the listing of unique verbs may have been too restrictive. Future studies should consider including words occurring two or three times within a text. Second, verbs most commonly used within student texts could be studied to research the extent of overuse.

Comparing the numbers between LD and WC was one way to strengthen the argument that more was *not* necessarily better; text length alone may not be the most accurate indicator of writing growth and/or quality without taking LD into consideration. For example, Vera and Inga had texts that decreased in WC, but the LD scores remained stable. This analysis demonstrates how WC does not capture LD. Therefore, these were two phenomena that seem fruitful to analyze separately even in very young students' writings.

It was clear that the Pre-DV and Post-DV were most comparable, as the texts were written under comparable conditions, within the same genre, and with a similar writing prompt. It was not surprising that five out of six students at a minimum doubled the amount of writing done from the first to the final prompt.

A panel of four raters scored the texts with a specific focus on word choice. There is a known concern about the tendency of centering scores within writing (Jølle, 2014). This could have occurred within this sample as there were zero texts with a score of 2 and four texts scored as a 5. The developments within writing can take time to be evident in the scoring of the texts of students. For example, Kjell's Pre-DV was scored as a 2 by one rater, and the fable text was scored as a 4 by one rater, yet, the consensus was a 3 for both texts. One could hope that within the continuum of a score of 3 that Kjell started at the lower end of 2 and was now approaching a 4.

In using different measures to track student development, it become evident that tracking development using LD and a rater panel provided different signals as to student growth and strengthens the argument that evaluating writing is a challenging task. There were several examples where the highest LD score does not align with the highest rated score. For example, Inga's fairytale text had a LD of 61 and rated as a 5, whereas the fable text had a LD of 73 and a score of 4. Julia's fairytale text had a LD of 64 and a score of 3, whereas the fable text had LD of 48

and a score of 4. Vera had the final three texts in the 50 range, (fairytale, 58.07; fable, 57.43; Post-DV, 51.89) but the scoring varied from a 3 to 5 (fairytale, 5; fable, 3; Post-DV, 5). While there was not a holistic scoring, other text dimensions could possibly influence the raters' judgement of scoring word choice.

5 Conclusion

In this study it was possible to trace relationships between texts, signaling intertextuality. Intertextuality was indicated from the learning strategy taught and the children's literature used in the teaching of three out of five texts (the Pre-DV and Post-DV texts were written to a writing prompt). The children's literature used to introduce the mod-fiction text, fairytale text, and fable text was read to bring awareness to the students of language as a repertoire of choices. These choices assisted the students in transferring skills not only to the three middle texts written (mod-fiction, fairytale, and fable) but also in many cases to the Post-DV text. Explicitly talking about and creating a shared terminology for word choice again heightened the students' awareness of selection possibilities for words in their writing. The practice of accepting and encouraging students to borrow text features seemed to allow young writers to experiment with words and phrases in a way that is worthy of continued research. How can a strategy of borrowing as a trace of intertextuality move to a wider set of approaches to learning and producing writing in later texts? Will the traces of transferring within these texts act as a scaffold for students in future texts? This leads one to believe that the strategies of using texts to illustrate writing practices, using a shared terminology for word choice, and encouraging students to borrow, can be effective in the classroom. However, how these strategies become part of a lasting 'toolbox' is also worthy of further research.

Word individuality, WC, and LD specify measurable changes within the texts indicating analytical tools can be used to study word choice among very young students. In addition, four raters were able to rate the texts based upon word choice. The focus on word choice as part of a shared terminology has led to the analyses, which indicated a need to continue to account for WC and LD. In future studies work will continue with adjectives and verbs while experimenting with nouns. The number of adjectives and verbs would continue to be calculated, in addition to lexical individuality within adjectives and verbs. However, lexical individuality needs to be defined less conservatively such that additional counts would be made to include adjectives and verbs occurring more than once. This would allow to further study effective use and overuse of adjectives and verbs.

Qualitative research designs such as case studies tend to produce results with limited generalizing power. In this article the main goal was not to generalize regarding word choice, but rather to locate relevant analytical tools to continue to study word choice. A need exists to continue studying word choice in young students' writings in a way that is dynamic and yet specific in order to provide information that can span a variety of genres and writing situations. These categories may be beneficial for teachers and researchers to better understand word choice in young children. If these categories allow for continued intertextual understandings to be traced, writing instruction may potentially be influenced in ways that afford transfer from literature.

Endnotes

[1] Dimensions are based on the six-trait writing model developed by Culham (2005) and Spandel (2009).
[2] A fractured fairytale is a fairytale written for children with a modern day twist changing the characters, setting, point of view, or plot.
[3] Guro and Malund School were fictitious names.

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