Literature Review: Working Memory and Genre Instruction in an Elementary Context

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Teaching children to write is a complex and sophisticated task that teachers undertake in all subject areas. For students to be successful writers, teachers benefit from developing a strong understanding of the writing process and the components necessary in a successful writing program. This literature review, relevant for teachers of young children, focuses on two aspects of writing. It first looks at current writing practices in North American schools, and the role working memory plays in learning to write. Secondly, it focuses on the effectiveness of teaching genre through the lens of Systemic Functional Linguistic (SFL) theory. Although limited research has been conducted on SFL in an English Language Arts context, and all the research included on SLF is from an Australian context, the results show positive effects on students' writing. Future research focusing on the impact of SFL in a writing classroom is highly recommended, especially for a North American classroom context. This literature review posits that when children receive explicit, research-driven writing instruction, writing performance improves.

Keywords: systemic functional linguistics, genre, writing, writing by hand, explicit teaching, working memory, elementary education

Learning to write involves the use of many cognitive processes. It is a demanding endeavor for many students, as learning to write is comprised of interwoven layers that build upon the next. Many teachers struggle to effectively teach this process, and many students struggle to write successfully due to the complexities related to the writing process (Cutler & Graham, 2008; Gilbert & Graham, 2010; The National Commission on Writing, 2003).

Even with the rise in electronic writing, writing by hand continues to be the most common form of communication in schools (Marr & Dimeo, 2006; Roberts et al., 2014). Writing is a necessary tool for many purposes (Graham, Harris, & Hebert, 2011). It is used for "gathering, remembering, and sharing subject-matter knowledge," and it is "an instrument for helping children explore, organize, and refine their ideas about a specific subject" (Graham & Harris, 2005, p. 19). Thirty to 60% of the school day involves written tasks (Dinehart, 2015; Lust & Donica, 2011), and the ability to write is necessary for school success (Schneck, Shasby, Myers, & DePoy Smith, 2012; Vander Hart, Fitzpatrick, & Cortesa, 2010). Instruction in writing is necessary for students in Alberta, as our results on provincial assessments are of concern.

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Alberta Education assesses children's literacy development by way of the Provincial Achievement Test (PAT), recently re-introduced as Student Learning Assessment (SLA), and these tests have not shown signs of improvement in writing scores for children in grade three (Alberta Education, 2013). Expectations for the PATs have been established by a group of teachers, based on their experience and understanding of what characteristics students need to demonstrate to meet the acceptable or excellent standards. Generally, the acceptable standard are scores between 50% and 80%, and the standard of excellence scores are reserved for students who score above 80% (Alberta Education, 2018). The multiyear report outcomes for the PATs, from 2009 through 2013, identify a lack of achievement at the standard of excellence in writing, with the percentage of those reaching that standard remaining stagnant at 14%, and an over-representation of students at the acceptable benchmark of 78% (Alberta Education, 2013, p. 1). Although at first glance this might not seem concerning, when compared to the PAT results in reading achievement, 40% of students in grade three are able to achieve the standard of excellence. These results suggest that many students are not achieving as much as they can in writing, and that schools are lacking in writing programs which are effective.

In addition to the PAT data, Alberta participates in The Early Childhood Development Mapping Project (ECMap, 2014), which assesses children's readiness for kindergarten in five domains: physical health and well-being, social competence, emotional maturity, language and thinking skills, communication skills, and general knowledge. The data from this Canadian standardized assessment is also cause for concern regarding the writing development and abilities of our young students. Only 50% of Alberta's children are deemed ready for their earliest formal learning experiences (ECMap, 2014) based on an assessment of the five areas of development. According to the data from the ECMap (2014), far too many youngsters are deemed vulnerable in one or two of the domains, and there is a significant percentage, 23% and higher, of students struggling in each of the five areas. Moreover, two of the five areas assessed are directly related to the early writing abilities of young children. The area of physical health and well-being looks at students' fine motor strength, one of the essential skills to engage with writing by hand. Language and thinking skills, a second domain, assesses students early interest in writing, and age appropriate writing skills and abilities. Almost one in four students entering kindergarten experience difficulty in these two areas. This is further evidence to support planning and implementing evidence-based writing interventions in elementary classrooms, in order to address student readiness. If we consider these results, and then look three years down the road to the Alberta PAT results, it is clear from the percentage of students reaching the standard of excellence that the reading abilities of our students are being well-addressed in classroom instruction. However, the writing results indicate that students' lack of readiness in writing skills and abilities as they enter school, as identified on the ECMap results, is not adequately being addressed and remediated by the end of grade three (Alberta Education, 2013).

The Alberta achievement outcomes, noted above from the PAT and ECMap results, suggest the need to intervene in the literacy development of young children. There is a need to tackle the lack of preparedness and writing abilities through programmatic instruction that is developmentally progressive. This can be achieved through writing instruction that focuses on making meaning by way of purposeful engagements with literacy learning, that includes providing direct and explicit instruction (Berninger et al., 2006; Brisk, 2012; Christie, 2008, 2012). Instruction in genre, using a Systemic Functional Linguistic (SFL) approach, is one way to address the writing gap and the lack of preparedness of the young students entering Alberta classrooms.

This literature review includes research from North America and Australia. The introduction and presentation of current writing practices relies on research conducted within a

North American context, as this context is familiar to me. The research on SFL, discussed below, comes from Australia, as Australia is where SFL was first introduced, and it continues to be the primary location for SFL-driven instruction. In this article, I analyze the writing instruction of elementary school-age children, framed by an understanding of working memory and its role in students' writing. I also present on the importance of genre instruction, and I examine research on the limited, but noteworthy topic of an SFL approach to teaching. The article concludes with a discussion of implications for future research.

Current Writing Practices

Research on writing practices in classrooms, especially elementary classrooms, is limited. The National Commission on Writing (2003) examined the writing practices in American classrooms and found that "the teaching and practice of writing are increasingly shortchanged throughout the school and college years" (p. 3). The commission listed several recommendations, the most relevant and noteworthy of which were the following: first, schools need to double the amount of time spent writing in classrooms; second, teachers should be required to successfully complete a course in writing theory and practice to understand the complexity of the writing process; lastly, universities need to offer pre-service teachers multiple courses on how to teach writing (National Commission on Writing, 2003).

In addition to these recommendations, research on American classrooms shows that pre-service teachers are not adequately prepared to teach young children to write. Cutler and Graham (2008) conducted a nationwide study with teachers from grades one to three to determine what writing instruction looked like in lower elementary classrooms. They found that a very small percentage of the school day was devoted to writing, and that on average, students only spent 20 minutes per day writing. Additionally, 72% of the teachers surveyed rated their writing courses in post-secondary education as poor, or only adequate in preparing them to teach young children to write.

In a nationwide study, Gilbert and Graham (2010) asked a random sample of teachers in grades four through six questions about their classroom writing practices. These questions focused on pre-service teacher preparation, amount of time spent teaching writing in the classroom, amount of time children spent writing in the classroom, and the use of evidence-based writing practices. The study found that a large percentage of teachers felt unprepared to teach writing, and 65% indicated that they received minimal or no preparation to teach writing while attending post-secondary school. Teachers in this study spent an average of 15 minutes teaching writing per day, and students spent around 25 minutes writing in class daily. Finally, Gilbert and Graham found that most teachers used some evidence-based practices, like providing verbal praise and encouragement, using direct instruction to teach writing skills, and having students set writing goals, but most of these were used infrequently in the classroom.

Research looking specifically at teachers' perceptions and skills in genre instruction has also been limited. Until 2016, there had been no published research that looked at the ability of teachers to teach young children genre. Reutzel, Jones, Clark, and Kumar (2016) were the first to look at elementary teachers' abilities to identify and explain text structures and features in school genres. Their results were similar to those discussed earlier regarding teacher preparedness. Reutzel et al. (2016) surveyed 21 elementary classroom teachers, from two different school districts. They found that teachers do not have a good understanding of text features or the text structures of children's stories and informational texts, and many were unable to sort text structures in narrative and informational texts. It was only 37% of the time that teachers could identify the

text type and features of informational texts. Teachers were able to do this only two out of three times, or 66.6%, for a children's story book. The research results are further evidence that there is "too little preparation in teacher education programs on understanding and analyzing text as an integral part of knowledge necessary for providing evidence-based comprehension instruction in the primary grades" (Reutzel et al., 2016, p. 91).

To date, there is little, if any published research on teachers' or pre-service teachers' feelings of preparation in teaching writing or genre in Canada. However, based on the Alberta PAT data, and my personal experience in schools for over a decade as an elementary school teacher in both English and French immersion classrooms, I believe that the results could mirror those of the US. An examination of the writing courses offered to pre-service teachers in Alberta raises serious concerns. After visiting the course selection websites of three main universities in Alberta (University of Alberta, 2015; University of Calgary, 2015; University of Lethbridge, 2015), I concluded that classes in early literacy are limited, and there are very few courses that focus on literacy instruction, available for student enrollment. Additionally, there is a severe deficiency in courses offered that focus solely on the teaching of writing; most of the literacy courses focus on the broad Language Arts curriculum.

For the remainder of this paper, the focus will be genre instruction in an elementary context. I discuss the impact of explicit genre instruction on working memory, what it can look like in elementary classrooms, and one way we can effectively teach it to children.

Working Memory

For young children, engaging in the writing process is complex. Learning to write is demanding, and a child's memory is engaged in multiple on-going processes (Christie, 2008; McCutchen 2000, 2011; Medwell & Wray, 2007). To understand the cognitive load placed on novice writers, it is important to understand the concept of working memory and its role in the writing process.

Baddeley (1986) was the first to recognize the role working memory plays in cognitive processing. He explains working memory as "the temporary storage of information that is being processed in any range of cognitive tasks" (p. 43). Other studies explain that working memory is an active process with a limited capacity (Hoskyn & Swanson, 2003; McCutchen, 1996; Towse, Hitch, & Hutton,1998). It is the ability to concurrently carry out processing activities while retaining information, and it is responsible for storing and transforming information (Hitch, Towse, & Hutton, 2001). In other words, working memory is a limited capacity system that is part of the human memory system responsible for both the temporary holding and processing of new and already-stored information, and manipulating information involved in the performance of complex cognitive tasks.

The two components of working memory are storage capacity and processing abilities (McCutchen, 1996; 2000). Storage capacity is the ability to store, access, and retrieve information stored in long-term memory, and hold this piece of information in working memory while completing a task. Processing abilities are described as the processes necessary to complete a task. Storage capacity and processing abilities compete for working memory attention, as "the limited resources of working memory necessitate trade-offs" (McCutchen, 1996, p. 302).

When working memory is engaged in the processing stage, there are three phases competing for attention: planning, translating, and revising (Hayes & Flower, 1980). Planning consists of goal-setting and designing a writing plan to guide the production of a text. The translating process comprises two parts. The first, transcription, is the physical act of writing a letter, word, or sentence

down onto a page. The second is text generation, which consists of generating ideas, and producing language corresponding to the information in the writer's memory. Finally, the revising phase entails a reviewing process to improve the quality of the text produced through re-reading and editing the transcribed text.

Working memory and the writing process. The relationship between working memory and the writing process has been intricately examined in the past two decades. Composition of written texts imposes considerable storage and processing demands on young children (Limpo, Alves, & Connelly, 2017; McCutchen, 1996). If there is too much strain, the constraints can exceed the child's working memory limitations, and writing performance will suffer (McCutchen 2000; Swanson & Berninger, 1996). If students cannot fluently produce texts, that is, if they cannot write down individual words and sentences fluently, the demands of working memory are sizable (Limpo et al., 2017; McCutchen, 2011).

Beginning writers' attention is usually focused on handwriting (Olive, 2012), and this limits the earliest stages of writing (McCutchen, 2011). According to Bourdin and Fayol (1994), poor handwriting imposes greater demands on working memory and leads to poorer performance on writing tasks. Furthermore, McCutchen (1996) stated that "the physical act of transcribing written text is a major drain on cognitive resources of beginning writers, and text generation itself is also less fluent for younger writers" (p. 319).

Working memory is engaged during every phase of the writing process: editing, translating, and revising (Hitch et al., 2001; Kellogg, 2001; McCutchen, Covill, Hoyne, & Mildes, 1994). Since working memory is crucial to the writing process, instruction in the three phases of the writing process, as identified by Hayes and Flower (1980), can help lessen the cognitive load placed on working memory and improve writing skill and performance (Kellogg, 2001; McCutchen, 1996; Peng & Fuchs, 2017; Yi & Luo, 2013). Once attention is freed from lower-level processing skills like handwriting fluency, room is cleared for higher-level processes, and working memory space can be allocated to other aspects of writing (McCutchen et al., 1994; McCutchen, 2011; Olive, 2012).

The working memory of young children is usually honed in the translating phase of the writing process. Thus, students usually ignore both planning and revising (McCutchen, 1996). Teachers need to help children reach a state of automaticity and flow in their handwriting, meaning that handwriting "can be effected swiftly, accurately and without the need for conscious attention" (Medwell & Wray, 2007, p. 12). Explicit instruction focused on writing processes, beginning with lower-level skills like handwriting and phonics, moving to higher-level skills like genre features, vocabulary selection, editing, and revising, is how teachers can lessen the cognitive load in working memory for novice writers and improve writing performance. When the writing processes of young children become proficient, more resources are available for higher-order thinking.

Working memory and genre. Genre can be defined as "recurrent forms of texts used for specific purposes, with specific discourse, organization, and language features" (Brisk, Hodgson-Drysdale, & O'Connor, 2010, p. 1). A genre can be identified by its structure, determined by the basis of its form and use, and characterized by particular patterns (Christie, 2008). There are various types of genres, each comprised of multiple sub-genres. In a school context, teachers, schools, and communities have developed and accepted certain recognizable text types, or genres, that are instantiated through specific features. The most common genres in elementary schools are fictional narratives, personal recounts of information, procedures, reports, explanations, and expositions (Brisk et al., 2010; Hodgson-Drysdale, 2013; Schleppegrell, 2001).

Skilled writers have access to genre knowledge, features, and rhetorical knowledge (McCutchen, 2000; 2011). Knowledge of genre is one of the writing components that must be present in an effective writing program, and an area on which teachers must focus. Therefore, a focus on genre in pre-service teacher preparation programs is essential for student success. McCutchen (2011) and McCutchen, Covill, Hoyne, and Mildes (1994) have examined the relationship between working memory and genre instruction. Familiarity with genre influences writing abilities by providing access to an organized schema of genre resources stored in long-term memory. When children employ these resources stored in long-term memory, this eases the working memory demands during the translating phase, which facilitates access to planning and revising strategies. Once students can fluently produce texts, working memory space is freed up to access information stored about genre (Hoskyn & Swanson, 2003; McCutchen et al., 1994; McCutchen, 2011). Comprehensive knowledge about genre will allow writers to move beyond the constraints of working memory, and improve writing performance. To affect change, teachers need to explicitly teach children various genres, and examine the features, language, and rhetorical knowledge associated with each of those genres.

Genre in the Classroom

For students to be successful writers in school and post-secondary institutions, and for adults to experience success at work, they must have a strong understanding of genres and of the writing process (Brisk et al., 2010; Christie, 1999; Fillmore & Snow, 2002; National Commission on Writing, 2003; 2005; Schleppegrell, 2004). Therefore, it is recommended for teachers to expose students to a variety of genres beginning in kindergarten and continuing through grade twelve and into university (Fillmore & Snow, 2002; Schleppegrell, 2004).

Simply exposing children to genres, however, is insufficient. According to Hodgson-Drysdale (2013), "knowledge of genres is not implicit and the language and structure of each genre must be taught" (p. 21). Genre must be taught through explicit instruction, and it is the responsibility of teachers to explicitly teach genre features, functions, and purposes, and make explicit the expectations associated with different genres to impact the writing skills of young children (Aguirre-Muñoz, Park, Amabisca, & Boscardin, 2009; Brisk et al., 2010; Quinn, 2004; Schleppegrell, 2001). The assumption related to the idea that instruction in genres must be made explicit is twofold. Teachers have a developed understanding of genre types and a deep understanding of the structures, features, patterns, and purposes associated with the most common genres. In addition, teachers have the ability and expertise to explicitly and effectively explain, model, and teach this specific genre information to their students. These assumptions must be met in order for teachers to have a positive effect on children's writing.

Genre and systemic functional linguistics. One way that teachers can frame genre instruction in a classroom context is through Systemic Functional Linguistics (SFL). Systemic Functional Linguistics theory was developed by Halliday (1994) and was first introduced in teacher education preparation and English Language Arts (ELA) programs thirty years ago in Australia. English Language Arts programs focus specifically on teaching literacy skills, such as reading, writing, listening, and speaking. Systemic Functional Linguistics examines how language is used, the purposes it serves, and how we achieve those purposes (Halliday, 1994). Systemic Functional Linguistics is one way we can construct meaning from a text, achieved by focusing on the functional aspects of the language being used (Anderson, 2013). Simply put, SFL is the study of the relationship between language and its functions in social settings. It is a more explicit way of teaching specific language features and writing structures of academic genres. It helps students

understand what they need to write in order to be understood, accepted, and successful in a school context (Schleppegrell & Go, 2007).

Implementing SFL theory to teach genre focuses on how the language and structure of writing tasks vary by genre (Brisk, 2012). Individual genres are made up of registers, and the register is what differentiates one genre from another (Christie, 2012; Schleppegrell, 2001). The linguistic features that make up a specific register are what allow us to read a text and form an impression on the text type (Schleppegrell, 2001). A register is defined by three key features: field, tenor, and mode. Field refers to the lexical density of the text, and how the ideas are expressed through content words and content-specific vocabulary. These language choices are dependent on the context of the situation. Tenor refers to the relationship between the writer and the reader. Tenor ranges from the use of personal language to impersonal language. The channel of communication, such as written versus spoken or formal versus informal, refers to the mode (Aguirre-Muñoz et al., 2009; Brisk et al., 2010; Quinn, 2004). These three features, when combined, form a register, which identifies the genre. Therefore, explicit instruction is necessary not only in purpose, function, and audience, but also in the way registers are used in the most common genres at school.

In an optimal elementary classroom setting, instruction on genres through SFL theory would resemble that of the gradual release of responsibility model, where instruction begins as teacher-led, then the teacher and students working together to construct knowledge, and ends with students working independently (Brisk et al., 2010; Pearson & Gallagher, 1983). The teacher would begin by deconstructing mentor texts in a certain genre to make explicit and obvious the features, functions, and purposes. Focus would also be on the audience and the registers, or the specific language choices associated with the genre, used. If the focus in a writing classroom is on the explanation of texts, for example, writing a text explaining how to build a snowman, a series of lessons might emphasize the use of third person rather than first person. In the second phase, the teacher and students would construct a text in the focus genre together. Finally, after many mini-lessons, practice, and feedback, students would construct a text independently (Brisk et al., 2010; Christie, 2008; Martin, 2009). This type of genre instruction using SFL theory "makes the linguistic expectations of academic language explicit and discernible to teachers and their students" (Aguirre-Muñoz et al., 2009, p. 300).

Systemic functional linguistics in the classroom. There has been a limited amount of research conducted in elementary classrooms to investigate the effectiveness of using an SFL theory to inform genre instruction and its impact on the writing abilities of young children. Additionally, most of the research conducted in elementary schools has focused on bilingual students, students who speak or are learning two languages fluently (e.g., Brisk, 2012; Wollman-Bonilla, 2000), and English Language Learners (ELLs), students whose first language is not English (e.g., Aguirre- Muñoz et al., 2009; Schleppegrell & Go, 2007). Little research has looked at SFL in the context of an ELA classroom. Nevertheless, the research available suggests that using an SFL approach to genre instruction has a positive impact on the writing of young children (e.g., Brisk, 2012; Brisk & Zisselsberger, 2011; Quinn, 2004).

Schleppegrell and Go (2007) and Aguirre-Muñoz et al. (2009) studied the impact of teaching middle school ELLs the functions and grammar features in specific genres in ELA classrooms. The studies demonstrated that when a teacher's understanding of genre improves, this has a positive impact on ELLs' academic writing. Schleppegrell (1998) conducted another study to determine if an SFL approach to teaching genre to middle school students would improve their science writing. The focus was on students in grades seven and eight who were learning how to write a descriptive paragraph on a science topic. All three studies found that when instruction in

the focus genre is explicit, students' writing competencies improved, and students experienced more success in writing.

Quinn (2004) also looked at expository science writing in a grade six science classroom. The focus of her study was not on the writing performance of students per se; rather, she focused on how, through explicit instruction of explanatory texts in science through the lens of SFL, students' knowledge and understanding of the genre improved. In Quinn's (2004) study, she found that explicit instruction of explanatory texts led to improved writing, and that the students developed a stronger understanding of the structure of the genre and could explain the use of some linguistic features associated with the target genre.

In an elementary school context, the findings are very similar to those revealed in middle school studies; moreover, the same challenges are present. The research is limited, and most of the research has been done with respect to teaching genre in the science classroom (Brisk et al., 2010; Honig, 2010; Matthiessen, Slade, & Macken, 1992; Tower, 2005; Wollman-Bonilla, 2000), or focuses primarily on bilingual students and ELLs (Brisk, 2012; Brisk & Zisselsberger, 2011; Wollman-Bonilla, 2001).

Studies focusing on elementary science classrooms have demonstrated repeatedly that when teachers scaffold the language and expectations of science genres, and when instruction is explicit, three things happen (Brisk et al., 2010; Honig, 2010; Matthiessen, Slade, & Macken, 1992; Tower, 2005; Wollman-Bonilla, 2000). The first is that teachers develop a stronger awareness of genres, and their instruction in the areas of functions, purposes, and linguistic features improves. Second, students themselves develop a stronger understanding of the genre being taught. Third, student writing improves.

There has been a small number of studies implemented to determine the effects of an SFL approach to teaching genre on elementary-aged students' writing with a focus on ELA classrooms (Brisk, 2012; Brisk & Zisselsberger, 2011; Wollman-Bonilla, 2001). Wollman-Bonilla (2001) examined the effects of explicitly teaching audience awareness on grade one students' writing in the genre of persuasive writing. Brisk's (2012) study examined the effects of explicitly teaching first, second, and third-person in grades three through five, on bilingual students' writing. Brisk and Zisselsberger (2011) investigated the impact on the writing of three bilingual kindergarten students' personal narratives after teachers had been taught SFL theory. In all three studies, students revealed a deeper understanding of genre, and the writing abilities of the elementary students improved.

Even though much of the above research focuses on elementary and middle school science classrooms, ELLs, or bilingual students, I posit that the results are also applicable to a general education English Language Arts classroom. The way in which we teach genres to students might benefit from following the same sequence of instruction, no matter what content area is the focus.

There are some researchers who critique explicit instruction in genre education, explaining the process is too prescriptive (Freedman & Medway, 1994), and that this type of instruction teaches forms and structures as empty and unconnected to students (Sawyer & Watson, 1987). Freedman and Medway (1994), and Sawyer and Watson (1987) argue that if we prescribe forms, structures, and functions too rigidly to students, they will not have the opportunity to be creative in their compositions. The authors further state that students should be allowed to experiment and play with writing in order to reach their potential success. While I appreciate this point of view, and agree that we need to allow children room for creativity and experimentation when they write, I would argue that by first providing a solid foundation in writing fundamentals we would be empowering our students to experiment with language and writing. Many researchers (Christie, 2012; Jones, Clark & Reutzel, 2016; Roessingh & Bence, 2017) support this view. Without the

knowledge and understanding of how to form a text, we cannot expect young children to write creatively, and with success.

Pre-service teacher training, or professional development training for current teachers, focusing on genre pedagogy through the lens of SFL theory, can offer a way for teachers to improve their own understandings of genres. This understanding can then be transferred to students, and will not only improve the students' understandings of genres and language, but will also improve their writing skills (Aguirre-Muñoz et al., 2009). Instruction must emphasize the functions, purposes, structures, and linguistic features of different genres (Brisk et al., 2010).

Research Implications

The way teachers organize and implement writing programs in schools is critical to student success (Brisk, 2012; Brisk et al., 2010; Graham & Harris, 2005; Roberts et al., 2014). In elementary classrooms, I believe there are five components that are essential to include in an effective writing instruction program for students to achieve success: printing, high-frequency words, spelling, genre instruction, and vocabulary. These components are evident in the literature on research-based practices and recommendations by educational experts in the field of writing (Bear, Invernizzi, Templeton, & Johnston, 2012; Berninger et al., 2006; Dinehart, 2015; Graham, MacArthur, & Fitzgerald, 2013; Joshi et al., 2008; Temple, Nathan, & Temple, 2013). While this paper has only focused on genre instruction, I believe that by explicitly and systematically exposing young learners to all five of these foundational components, teachers will provide their students with the necessary basic tools for success in communicating their thoughts, dreams, and discoveries throughout their lives.

The research on genre instruction and SFL is limited, but it is unmistakably clear that through explicit instruction of genres, with an understanding of an SFL theory, the writing performance of students improves. Further research around teaching genre from an SFL perspective to determine the impact on young students' writing skills is necessary. It would be beneficial for this research to focus on the development of young children's writing in the ELA classroom, and on all learners, rather than just ELLs.

Limitations and Conclusion

This literature review was limited by the available research on the topic, and the argument that instruction should occur in a direct and explicit manner. The research looking at pre-service teacher preparation and teaching young children to write is limited, and thus far I have not found any conducted within Canada. Additionally, due to the limited amount of research around SFL, and the fact that the research took place in Australia, the generalizability of SFL to a North American context is limited. Moreover, my beliefs around early literacy instruction are present throughout this paper. SFL strongly aligns with my belief that instruction is most effective when direct and explicit, and that this type of instruction leads to the highest amounts of success for young children. Because of this position, the research reviewed for this paper is partial towards my teaching philosophy.

As per my discussion throughout this paper, it is clear that writing is a complex process: one that is not easily taught or learned, and one that involves many interwoven components. Instruction in genre and the way we teach children to write needs to be explicit for students to experience success. The information stemming from this literature review will add to the growing body of research highlighting the importance of early literacy skills development, specifically the importance of explicitly teaching the most common genres in schools, using an SLF lens for

instruction. A further examination of the impact of explicit genre instruction on the writing abilities of young students, focusing on using SFL, will be beneficial for teachers, university educators, and students. Continuing to investigate SFL is essential as a large percentage of our young students in Alberta are entering the classroom not ready for school (ECMap, 2014). Our provincial achievement test data for students in grade three, in writing, echoes this lack of readiness (Alberta Education, 2013), and hints at the lack of effective instruction to develop children's writing abilities. Additionally, by focusing instruction on genre, the cognitive load placed on students' working memory will be reduced, allowing room for a focus on higher level skills to be incorporated in their writing.

Preparing pre-service teachers to teach genre to elementary school-aged children, by focusing on SFL theory, can lead to improved writing. Learning to write cannot be achieved by simply exposing children to the writing components and processes, but rather through planned, direct, and purposeful instruction. It is my belief that when instruction in genre is direct and systematic, this will help students develop the literacy skills they need to be successful in school.

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