

Response to the Ontario Human Rights Commission's Right-to-Read Inquiry Report
By Members of the Centre for the Science of Learning, Western University

Western University's Centre for the Science of Learning commends the Ontario Human Rights Commission's (OHRC) Right to Read Inquiry (RTRI) for completing a comprehensive report and would like to offer our support of all the recommendations. We encourage the implementation of these recommendations throughout Ontario, for all students. We are pleased to see the senior council champion a science-based approach to improving reading instruction and intervention, founded on what has been learned from current research on how children read. We applaud the report for emphasizing explicit and structured teaching as well as highlighting the critical importance of phonemic and morphological awareness. All these recommendations are entirely consistent with what has been learned about how children learn to read. Evidence-based instruction, from the early years onwards, is important for all students. However, just as important as high-quality instruction, is the need for early assessment to determine who is having difficulties, and to use the results of screening to pay special attention to those students who do not respond to interventions to provide them with assistance in increasing intensity, as needed.

The history of the Science of Reading can be found in the OHRC's report, so we will not delve too deeply into this except to say that the Science of Reading explores how children learn to read from recognizing letters at the beginning stages of learning to understanding and learning from complex text in expert readers. The Science of Reading is based on psychological research into language and reading processes using both behavioural and neuroimaging techniques to expand our understanding of how people, especially children, learn to read. What this research has shown is that reading is not a natural skill, but one that needs to be learned, and is learned best explicitly and incrementally (Adams, 1990).

Because we are not born with a reading brain, the process of learning to read involves changes in the brain such as the formation of new connections; for example, connecting visual and auditory pathways for learning sound-to-written-word correspondences. While we are born with a brain that is ready to learn spoken language, reading has only been around for the last few thousand years of human history, and so there are no specialized neural circuits for reading at birth - the 'reading brain' is the outcome of learning (e.g., Dehaene, 2009). Furthermore, some children, including those with developmental dyslexia, do not readily master the skill of reading and develop reading difficulties. Therefore, all children require explicit instruction, and we cannot rely on reading instruction techniques that emphasize learning through mere exposure or sustained silent reading.

So, what can be done to help those who have reading difficulties? As the OHRC has recommended in their report, evidence-based instruction needs to be implemented in the classroom, for all students, not only those with reading disabilities. The ability to learn to read varies between students and there does not exist a definitive cut-off point where everyone above a certain score on a specific test is having no difficulties with reading, while those below the cut-off can be classified as having a disorder (e.g., Peters & Ansari, 2019). It is important

to consider that challenges with learning how to read are thought to be influenced by a multitude of factors such as the child's home environment (e.g., how much parents practice reading with their child), genetics, loss of instructional time due to the COVID-19 pandemic and lack of evidence-based instruction. Evidence-based instruction consisting of, but not limited to, phonemic and morphological awareness has been found to help all students to learn, not just those who can learn regardless of the type of instruction.

The Science of Reading has shown that before students are asked to read text for comprehension, they need to learn how to decode written language by connecting letters to speech sounds. In concert with developing fluent word recognition, instruction needs to focus on the knowledge, vocabulary, language structure and verbal reasoning skills needed to support language comprehension, which, in turn, facilitates reading comprehension. A focus on oral language and oracy and building a knowledge-rich curriculum are crucial to supporting early readers to become expert readers (Castles et al., 2018).

The idea that children will learn to read from context and picture cues only makes sense if they already know how to read. With that in mind, we agree that phonemic awareness should be the starting line for any reading instruction. But just as importantly, phonemic awareness alone is not sufficient to promote successful early reading. It needs to be accompanied by phonics instruction that emphasizes learning letter-sound knowledge, such that children are explicitly taught early on how the sounds they are learning correspond to individual letters and common spelling patterns.

There is a strong evidence base for reading approaches that incorporate explicit phonics. In laboratory studies for example, individuals who received explicit instruction in an artificial language learned how to read in that language, while less than 25% of those who were only passively exposed to the sounds and writing of the artificial language were able to learn it (Rastle et al., 2021). Additionally, a child's progress should be monitored through regular evidence-based assessment by the educator to increase the likelihood that reading difficulties can be identified early and tiered interventions put in place if needed.

Western's Centre for the Science of Learning applauds the OHRC's recommendations that evidence-based instruction be implemented in the classroom. Beyond changing the way that reading instruction is taught in our children's classrooms, we suggest that there exists an urgent need to systematically examine and update the way reading acquisition is taught to pre-service teachers at Faculties of Education across the province of Ontario. Teachers should be educated on how children learn to read, and how to implement evidence-based instruction and progress monitoring in their teaching. There exists a clear scientific consensus on how children learn to read and how this can be translated into instruction and assessments. Students deserve to receive instruction that is informed by the Science of Reading. Let's heed the evidence and not rely on opinions about how children should learn to read. Simple, easy to use evidence-informed screening tools need to be incorporated into teacher education for the continuous tracking of student progress (Adlof & Hogan, 2019). Additionally, teachers need to be aware of multi-tiered responses-to-interventions that are available to them in their area and equitable

access to these interventions needs to be ensured across the province, so that students are able to receive the help they need when they need it. While courses do exist at some Ontario Universities on how to teach struggling readers, we contend that the findings of the report make it imperative that such courses, grounded in the Science of Learning, are made mandatory for pre-service teacher candidates and are harmonized province wide. We are pleased that the OHRC council has recommended that teacher education be examined and changed to ensure that teachers have the knowledge and materials to implement evidence-based instruction in the classroom.

Further, we would recommend a greater emphasis on writing instruction to equal that of reading instruction. As the report stands, its predominant focus on reading, and not writing, is akin to recommending that students should learn to listen, but not to talk. Students with reading difficulties nearly always have difficulties with writing. For most students with learning disabilities in reading, the twin areas of greatest difficulty are decoding in reading and spelling in writing (Graham, Collins & Rigby-Wills, 2017). Both are frequently underpinned by deficits in phonemic awareness. Interventions that significantly impact reading, such as the Orton-Gillingham and Phono-Graphix methods, consist largely of students applying phonics skills to spell words. Additionally, students with learning disabilities have difficulties composing texts, such as stories and opinion pieces. Strategy instruction teaches students how to generate and organize their ideas for writing. This method produces large gains in written composition (Gillespie & Graham, 2014). More generally, programs that balance reading and writing offer an effective approach to class-wide elementary literacy education (Graham, Liu, Aitken, et al., 2018).

Western University's Centre for the Science of Learning is an advocate for ensuring that scientific research on learning is applied to the classroom. We cannot think of a better example for how to achieve this than to heed the applicable insights from the Science of Reading. The OHRC Right to Read Inquiry Report has laid out a well-researched roadmap for how to bring about important and evidence-based changes to education in Ontario that will benefit all learners, ensuring that no reader is left struggling while others excel. Implementing evidence-based instruction in the classroom and ensuring that all teachers are informed of such instruction methods and of available assessments to monitor progress and interventions will be beneficial to all students. We urge Ontario's Ministry of Education to move quickly to implement the OHRC Right to Reading recommendations.

Signed by Members of Western University's Centre for the Science of Learning

Daniel Ansari, Lisa Archibald, Marc Joannis & Perry Klein
(listed alphabetically by last name)

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