

STATE REPRESENTATIVE • 69th ASSEMBLY DISTRICT

April 18th, 2019

Rep. Kulp: Testimony for Assembly Bill 110

Chairman Thiesfeldt and members of the Assembly Committee on Education, thank you for giving me the opportunity to testify on Assembly Bill 110.

In 1994, Wisconsin ranked 3rd in the National Assessment of Educational Progress's reading scores which has since declined to 34th in the country by 2017. Most other states have some form of dyslexia legislation. The state of Oregon passed dyslexia legislation last year and just recently the state legislature of Georgia passed a dyslexia screening bill that is waiting to be signed into law. Wisconsin is falling behind the rest of the country in reading education!

Many parents with dyslexic children have reached out to our office. They tell of the struggles they go through to get their kids the help they need. More often than not their local school districts do not have the tools or the programs to identify or help the children with dyslexia to learn to read. I myself have three kids with dyslexia and I understand the challenges involved.

I chaired with Senator Patty Schachtner the 2018 Legislative Council Study Committee on the Identification and Management of Dyslexia which created Assembly Bill 110. The Dyslexia Study Committee's purpose was to focus on dyslexia since amongst all the different learning disabilities in Wisconsin we haven't before focused on this issue. All five Study Committee meetings with the testimony, documents and WisconsinEye footage are available online. After many discussions from many experts in literacy education, we developed this bill to create a dyslexia guidebook as a tool that was not previously available to our school districts. It was referred to this committee by the Joint Legislative Committee in a unanimous bi-partisan vote.

We are looking to give parents and children more tools than currently available to learn to read. When a child does not learn to read, they are less likely to graduate high school and are less likely as an adult to become incorporated into our society. This bill takes a step in the right direction in ending our policy of letting children fall through the cracks. We will be hearing from advocacy groups, parents, teachers and children today who will be sharing their stories. I look forward to hearing all of their testimony.

Thank you Mr. Chairman.

REPRESENTING WISCONSIN'S 69[™] ASSEMBLY DISTRICT

as several other states have implemented changes Wisconsin's rank has fallen dramatically



In 1994 <u>Wisconsin</u> ranked 3rd on NAEP reading scores.

In 2017 <u>Wisconsin</u> ranked 34th nationally.



To: Assembly Education Committee

From: Kathy Champeau, Legislative Chair

Date: Thursday, April 18, 2019

Re: Testimony opposing 2019 Assembly Bill 110, Dyslexia Guidebook

Why does WSRA oppose Assembly Bill 110.

Mr. Chair and members of the Committee, the Wisconsin State Reading Association supported this original bill draft proposed by the Study Committee. I would like to repeat that. The Wisconsin State Reading Association supported the original bill draft proposed by the Joint Legislative Council Study Committee on this issue. I personally had conversations with Representative Kulp and Senator Schachtner communicating that support. We stated that in a letter and in our testimony to the Study Committee on September 18th.

However, there were changes to the bill draft by the Study Committee that cause us great concern.

1. Vendor financial "conflict of interest" protections were removed from the final bill draft.

Those vendor conflict of interest provisions are related to the guidebook advisory committee. We believe that individuals who are selling products and receive income from selling products should not be developing the information and guidance that will affect our children. Vendors have an inherent conflict of interest because their ultimate goal will always be sales of their product because that is how they generate their personal income. I suspect we have all seen and heard of how vendor product influence and bias affect outcomes and policies, examples: federal literacy programs, pharmaceutical policy, etc.

The Study Committee at its last meeting in December removed/deleted the financial conflict of interest protections for the appointees of the guidebook advisory committee. The financial conflict of interest had specified "that a member of the advisory committee cannot be the seller of a product relating to dyslexia, including products related to teaching instruction or teaching interventions" [Report to the Joint Legislative Council, Feb 1, 2019, Page 10, third bullet point and LRB-0383/2, Page 4, Lines 6-10].

2. The proposed guidebook should inform on ALL literacy \ reading related conditions - not be a marketing tool to promote one condition.

The original bill draft (LRB-0383/P3) provided for creating a guidebook for "*reading difficulties and dyslexia*" to ensure that this document educated parents and educators about the reading difficulties and reading disabilities including dyslexia. Unfortunately, the Study Committee amended and deleted this reference throughout the bill draft to instead focus on "*dyslexia and*"

related conditions" (LRB-0383/3) [Report to the Joint Legislative Council, Feb 1, 2019, Page 10, first bullet point].

WSRA supported the original focus and stated that "it is evident that parents of children who have been identified as dyslexic feel uninformed and at a loss to understand what they need to know to be active partners in their children's education. We believe a guide as originally proposed would serve a useful purpose and WSRA wishes to be part of the development of this important tool, if this project is accepted. WSRA commends the leadership and is appreciative of both Chair Representative Kulp and Vice-Chair Senator Schachtner for making sure there is broader representation on the proposed guidebook committee by including membership from both the Orton Society and WSRA."

3. "Dyslexia" definition included in the guidebook draft is controversial and not uniformly accepted by literacy and mental health experts in the field.

It was stated during the Study Committee process by the Legislative Council staff, that it is unusual for the state legislature to define in statute diseases, conditions and diagnoses. In short, it begs the question, who is best suited to define a disease, disorder, condition or diagnosis? The medical profession or the "body of politic?" That is the basis of our concern.

The medical profession, specifically the American Psychiatric Association, who publishes guidance on disorders which is where dyslexia can be found, was unable to come to consensus and unwilling to define dyslexia. However, you're being asked as a state legislature to take the unusual step of creating a definition of dyslexia in statute, a definition that has also not been accepted by the health care and medical profession. While I realize this is considered a "non-statutory" provision, that is not how it will be marketed and used throughout the State of Wisconsin and the country and why we believe there is such intensity to make sure that it is.

It is already happening. I ask all of you to go online and Google "franchising your own dyslexia clinic." That is why it is so important to allow the healthcare and medical professions come to consensus on these types of definitions. What you are being asked as a State Legislature, is to provide an official state sanctioned definition of what is purported to be a medical and mental health condition. We believe the definition in this proposed bill is broad and could co-opt or usurp other disorders, conditions and identifications. Our concern is that most probably a guidebook under this premise will lead to a confusion, misidentification or misdiagnosis.

The proposed guidebook should inform on ALL literacy \ reading related conditions - not be a marketing tool to promote products and sales of one condition.

Tony Evers Governor



Mishelle O'Shasky Chair

Inshirah Farhoud Second Vice-Chair

State of Wisconsin

Wisconsin Council on Mental Health 1 West Wilson Street, P.O. Box 7851 Madison, Wisconsin 53707-7851 mhc.wisconsin.gov

Testimony in Support of 2019 AB 110 Assembly Committee on Education April 18, 2019

The Wisconsin Council on Mental Health appreciates this opportunity to submit testimony in support of AB110, for developing a guidebook on dyslexia and related conditions for parents, guardians, teachers and administrators.

While dyslexia is not a mental health diagnosis, it is clearly a mental health-related issue, at a time when families and schools are struggling with increased levels of anxiety, depression, suicidal ideation and suicide itself.

According to the Yale Center for Dyslexia and Creativity, 20% of students have dyslexia and 85% of students with learning disabilities have dyslexia. Students with learning disabilities have a three times higher risk of attempting suicide than their peers¹, and up to 89% of suicide notes contain dyslexic-type spellings¹¹.

On the broader level, anxiety and depression are both associated with dyslexiaⁱⁱⁱ. Students with dyslexia often experience the frustration of being viewed as not trying hard enough, coupled with their own frustration at not being able to easily learn what they see their peers being able to learn.

Conversely, when a child with dyslexia is properly taught to read, they can experience improved self-esteem, their overall mental health outlook improves, their confidence improves, and the resulting hopefulness echoes into many areas of their lives. Dyslexic students who are supported have lower rates of drug use and abuse and lower suicidal thoughts.

Wisconsin has never had a centrally-developed guidebook resource to help families and educators better help children with language-based learning differences and dyslexia. The guidebook as proposed in AB110 would provide guidelines on screenings for early identification and would recommend evidence-based interventions, as well as pointing to available resources. Creating the guidebook would be an important fundamental step toward offering the basic information towards helping students with dyslexia.

The Wisconsin Council on Mental Health urges the Assembly Committee on Education and the legislature as a whole to pass AB110 into state statute.

For further information please contact the members of the Wisconsin Council on Mental Health at wcmh@wisconsin.gov.

Suicidality, School Dropout and Reading Problems among Adolescents. Journal of Learning Disabilities, 2006; 39(6): 507-14.

Learning Disabilities and Adolescent Suicide. *Journal of Learning Disabilities*, 1997;30(6): 652-9.

^{III} M. Ryan, "Social and emotional problems related to dyslexia" <u>http://www.ldonline.org/article/19296/</u>

Hello, My name is AJ Coronado. I am in 6th grade and I am 12 yrs old. I attend Waukesha STEM Academy Middle School. Someday, I want to be underwater investigator to help police find clues to solve crimes.

4-18-19

I am here today to tell you that school is really hard for me. It is hard for me to read & write & solve math. I know I am smart, but I get frustrated because I can't write a word correctly. Even when I take my time sounding it out, a lot of times. I have to ask someone else how to write something because I can't write it on my own. I use my Ipad and it helps me because my Ipad can speak and it writes the words. Keyboards are not as helpful.

In school, we do something called Edu-typing and usually my score are 14 words per minutes and it makes me sad. when I look over at one of my classmates and I and see their score are 50-60 wpm and it make me feel bad.

And when the class is working together like the whole class is writing things down they go really fast and I can't keep up with them and I am still writing notes and everybody is working on something else completely different while I'm in the back of the class, struggling trying to keep up.

I am here today because I hope other kids get the help they need because I do not want other kids to go through what I have to go through every day. I hope you decide to help teach teachers and help parents work together instead of fighting in big meetings. Please pass this and do the right thing for me and other kids.

Thank you, AJ Coronado

200 Tenny Ave Way Kesha, WI 33186

Dyslexia testimony 4-18-19 Thank you for this opportunity to share how Dyslexia has impacted my life. My introduction to Dyslexia started with my father who served our country, yet he couldn't read a newspaper and needed the support of his daughter to write a check at the grocery store, even though I was a child. I witnessed everyday how my father did his best yet couldn't keep a steady job. He turned to alcohol to numb his pain, suffering a lifetime of missed opportunities, judgement, and shame.

My journey with dyslexia continues, as a wife to my highschool sweetheart, who I respect and cherish. I see daily how Dyslexia steals and rob's my husband's confidence, his self esteem, and provides shame, anxiety, self-doubt.

Dyslexia further perpetuates in my life through my children. My son AJ, is here with me and He will share his own journey with Dyslexia and I will share what it has taken to access what he needs to be a successful student in our public schools.

As AJ entered 4k and then again in kindergarten, I knew in my heart he was dyslexic yet I was told by school "We don't test for that here." No further information or support was provided to me and for the next 3 years I requested special education evaluations to be completed. In third grade my son finally qualifed for an IEP.

AJ is currently in sixth grade and has a large 4-5 year achievement gap which is making a huge impact in his education and mental health. In the documentary, The Kids We Lose, Dyslexia is highlighted as one of the- root causes to children's' mental health issues in our public schools. I urge you to approve AB110 into law. Kids, teachers, administrators in Wisconsin need your help and support. Thank You,

Kimberlee Coronado 200 Tenny Ave Waukesha, WI 53186

gentlmen adies and Land Fam d third Grad years and *** L think that we show a law about teaching to how to recognize dusteria Know how to help. It make teachers helpfl for other children to learn toon not just children these rules that have dysteria. Another reason life is easier things their kids Parens to get things their kids need to leach. Children Can read and write better and Kids don't leave the School. Now you Know why I Want AB 110 and AB 20 thank vou Kryla klimet

Melissa Klimek 4/18/19

Regarding Assembly Bills 110 and 50

Representative Thiesfeldt, Representative Kitchens, and Committee members, thank you for taking time to hear us today. My name is Melissa Klimek and I am here with my daughter, Kyla, and my friend Nan Rozelle from Hortonville, WI. I am here representing Decoding Dyslexia-Wisconsin, in support of Assembly Bill 110 and, though we aren't addressing it today, Assembly Bill 50.

How many times per day do you read? How often do you look at the ingredients on a food package? How often do you quickly check a news or stock ticker on the bottom of the TV screen? How many road signs do you glance at when looking for a gas station? Reading is an intrinsic part of our daily lives, but we are not "programmed" to read. Imagine if these seemingly simple daily activities were a struggle...

Today you are surrounded by families and individuals that either are dyslexic or have been impacted by dyslexia. There are so many misconceptions about Dyslexia, both what it is and how it impacts a person's life, specifically his/her learning experience. Dyslexia is a language-based learning difference that affects phonemic awareness and phonological processing.

We have known about structured, research-based literacy approaches and how effective early intervention utilizing these approaches can be for decades, but, unfortunately, this research has not been implemented in the classroom. Our family is intimately acquainted with the length of this issue; my husband is dyslexic. My mother-in-law struggled with public school and resorted to recording her own "books on tape" for Chris. She taught him to read when the school was unable/unwilling to help. At one point, a counselor told my mother-in-law that she shouldn't expect much, that Chris would probably not make it through school. My husband was the valedictorian of his Physician Assistant class at Kettering College of Medical Arts in Ohio. It is a good thing that she did not believe the schools. Chris still can't spell, but he can shock your heart back into rhythm, if necessary.

Now, we have found that our daughter, Kyla, is very dyslexic, too, and we have run into the very same roadblocks that Chris experienced about 30 years ago. The teachers told me not to worry because "all kids reverse at this age." I asked the school for help for two years and was continually told that Wisconsin does not see Dyslexia as a disability and that she wasn't doing badly enough for interventions. Kyla should have been evaluated for an IEP as soon as I asked. After this, we gave up on the school because "bad enough" isn't acceptable with such an intelligent little girl. She wants to be an Engineer because she loves Legos. We started taking Kyla to the Dyslexia Reading Connection in Appleton and she is now reading at grade level. Because of how her brain processes language, she still needs accommodations such as: no timed tests, technological support with text to speech adaptions, etc.

I am asking you to, please, pass AB 110 and 50 for the 30, 000 students in Wisconsin that are affected by Dyslexia. They are more numerous than the entire population of Stevens Point! The structured literacy methods that work to teach our dyslexic students how to read are also extremely effective with typical readers. The teachers that we have interacted with are asking for training. They are great people that want to teach our children to read, they are simply lacking the necessary tools. You have the power to put these tools into their hands.

Thank you for your time,

Melissa Klimek

Dear Committee Members,

Thank you for the opportunity to share my thoughts on this bill. My name is Amy Rogers, and I am a speech-language pathologist and dyslexia specialist. I've been working with individuals with dyslexia and their families for nineteen years, fifteen of which have been here in Madison in my private practice. I've worked primarily in intervention, but most recently, my practice has also included the assessment and identification of dyslexia.

Why am I supporting this bill? The way I see it, there is no downside to providing necessary information to the educators who need it, and it is a step in the right direction.

The biggest frustration I face in my role supporting students and families is WASTED TIME and the significant and far-reaching effects of not identifying and intervening properly with students at an early age. 75% of the referrals I receive for intervention are in third grade or later. 80% of those individuals that we tested were in upper elementary school, and far too many of that number in middle and even high school before they were diagnosed with dyslexia.

Why does that matter? What I see happening, as reported by these students and their families, is unnecessary frustration and misunderstanding during those early years. So often, I hear the same stories: The family notices early on that reading is not progressing as they expect. They are told by the teachers they trust to keep reading to their child. The teacher is trying everything possible based on what they know, but cannot figure out how this very bright, clever, creative kid cannot read well, spell, or write. They are confused by the fact that despite reading painfully slowly and poorly, these kids, at least in the early years, seem to make sense of what they read, so in a sense, they seem "ok".

Furthermore, because these children are not only bright but overwhelmingly hard-working, and often very compassionate and charming, the monumental struggles they experience day in and day out in the classroom go unnoticed or misunderstood. Each day in the classroom, these kids are asked to do the one thing they don't do well nearly all day long, without appropriate help and understanding of their struggles. Even so, they continue working, often with extensive support from their parents, all the while feeling frustrated and exhausted at best, and at worst, developing a very negative self-image as a poor student. Or that they're dumb. And that couldn't be further from the truth. Finally, some fortunate families find a path on their own to get their child assessed and again, on their own, find the intervention their child needs, after far too many years of struggle. And those kids are the lucky ones.

Many many others never find that path, and continue their struggle for their entire educational experience. I have no doubt that NO ONE wants this for any child!

I want to emphasize that. Our teachers are trying their best, but are missing key information that would get these kids on a path of understanding themselves and getting the specific kind of help they need to overcome their challenges. It is as if we are asking teachers to teach these kids with their hands tied behind their backs. All this bill is doing is providing this much needed information, it is so simple, really, but even just this step can begin to change the course of these children's lives. Just making this information available can enable students to be identified earlier, begin understanding their struggles and their strengths, and hopefully get on the path to the intervention they need to become confident, happy, students.

Not giving this information to educators creates unnecessary obstacles. With every moment of misunderstanding, we are creating another mountain for that child and his family to climb and putting them more at risk for academic failure and negative emotional consequences.

There is no downside to this bill. Why not give teachers, staff and administrators this crucial information they need to help their students? Would we ever consider denying a physician access to the most updated research that could change the path of treatment for the better? Let's do all we can to give our educators what they need to support our students with dyslexia.

There is no downside to this. Please vote to support this bill!

With sincere gratitude, Amy Rogers, M.A., CCC-SLP

- 1. Shawn Anthony Robinson PhD
 - a. Senior Research Associate; Wisconsin's Equity and Inclusion Laboratory (Wei LAB), University of Wisconsin Madison.
 - b. At-Large Director, International Dyslexia Association, Baltimore, MD.
- 2. To Chairperson Thiesfeldt, Kitchens and members of the Assembly Education Committee.
- 3. The Assembly Bill #110 (Dyslexia Handbook) is a necessary first step in addressing an issue effecting 20% of the students in classrooms and a resource that could help those who want to learn and do more on dyslexia, but it can't stop here.
- 4. Wisconsin is ranked 49th in reading proficiency for African American students and 41st for White students;
 - a. The reading gap between those students is the fifth largest in the country, and this gap represents approximately three grade levels (Wisconsin Reading Coalition, 2018).
 - b. In 2017, African American fourth graders scored 206 on the most recent Reading Test of the National Assessment of Educational Progress (basic-level) compared to Whites who scored 232 (proficient).
 - c. African Americans are:
 - Two to three times more likely to be diagnosed and placed in classes for emotional and behavioral disorders rather than Learning Disability (i.e., dyslexia) compared to their White peers (Robinson, 2018, 2016, 2015, 2013; Robinson, Ford, Hartlep, & Ellis, 2016; Robinson & Thompson, 2019).
- 5. The University of Wisconsin, Wisconsin Idea foremost value is that "education should influence people's lives beyond the boundaries of the classroom".
 - a. I am a product of the Wisconsin Idea, as I started my journey at the UW Oshkosh reading at an elementary level.
 - i. Dr. Robert Nash saved my life at the age of 18 and gave me the tools needed to succeed beyond the classroom. I was in school for 18-years to after H.S. to earn my Bachelors, Masters, and PhD.
 - b. Invited to the Whitehouse to discuss my scholarship.
 - c. Interviews with NBC news.
 - d. Consulted with the Wis. Dept. of Corrections to train teachers on the science of reading (*The Journal of Correctional of Education* (2018); 69(1), 60-72).
- 6. For the next generation of students with dyslexia, Assembly Bill #110 must include policy on early identification and effective teacher training in order to make the dramatic changes needed to impact students' lives and help them maximize their educational potential in and beyond the classroom. This is the Wisconsin Idea, and the time for change is now!
- 7. I appreciate the opportunity to speak to the Assembly Education Committee.

To: Assembly Education Committee From: Deborah Cromer. WSRA President Date: Thursday, April 19, 2019 Re: Testimony opposing 2019 Assembly Bill 110, Dyslexia Guidebook

Thank you, Representative Thiesfeldt and members of the Assembly Education Committee for giving me the opportunity to speak today. My name is Deborah Cromer, and I am the current president of the Wisconsin State Reading Association. I am also a reading specialist and reading teacher in Western Wisconsin. I have been a literacy educator for over 40 years and have worked with students and teachers, K-12. Whether in regular classrooms or as a literacy specialist, I have worked with students who struggle throughout my career. The mission of the Wisconsin State Reading Association is to provide leadership, advocacy, and expertise so that ALL students in Wisconsin achieve high levels of literacy. Our concerns related to the proposed legislation in no way deny the existence of reading difficulties and the struggles of children and their families to deal with those difficulties.

WSRA supported the original version of Assembly Bill 110; however, we can no longer support this bill because of changes made at the last hearing of the Joint Legislative Study Committee on the Identification and Management of Dyslexia.

These are WSRA's concerns:

- First, the study committee lacked diversity and multiple perspectives, and no representatives from WSRA, the largest literacy professional organization in the state, were selected to be voting members. The composition of the committee is a shift from past practice, and the resulting legislation reflects that limited perspective.
- Second, vendor financial conflict of interest provisions were removed from the final draft of the bill related to the creation of the guidebook and the composition of the guidebook advisory committee.
- Third, the proposed guidebook should inform on all reading related conditions and not be a marketing tool to promote one condition.
- Fourth, the IDA Orton Society definition of dyslexia included in the guidebook draft legislation is not uniformly accepted by literacy researchers and mental health experts in the field. WSRA concurs with the American Psychiatric Association who carefully and extensively reviewed and analyzed this issue for their DSM-5 manual. They concluded that "the multiple definitions of dyslexia and dyscalculia meant those terms would not be useful as disorder names or in the diagnostic criteria." <u>https://www.psychiatry.org/psychiatrists/practice/dsm/educationalresources/dsm-5-fact-sheets</u>
- Fifth, the proposed legislation has the potential to exacerbate children's reading difficulties by limiting or negating the ability of teachers like me to use our expertise and years of experience to customize instruction to meet each student's needs.

In conclusion, legislation has consequences. Educators, like the medical profession, seeks to do no harm.

5 C - C - C

"Problems of phonological/phonemic awareness have been repeatedly shown to be associated with poor decoding, although it is now recognized that these cannot account for all those with a reading disability. A significant proportion of poor readers do not present with phonological difficulties, and others with such a deficit do not encounter problems in learning to read. . . Recognition of the complex, multifactorial nature of reading problems has resulted in greater acceptance that a simple, causal account or model will not prove sufficient." *The Dyslexia Debate* by Julian G. Elliott and Elena L. Grigorenko, Cambridge University Press, 2014.

Hello and thank you for allowing me to testify today. I'm Libby Wallace. Who remembers an experience in a classroom when someone was having trouble sounding out a word? What happened? Did the teacher point it out, say the word and act as if the person wasn't trying or was being lazy? The statistic is one in five. /One in five people have dyslexia./ There were 870,000 Wisconsin students in 2013. 175,000 of them *have* dyslexia. I have been teaching for over twenty years and working as an Orton Gillingham Language Specialist for seven. The difference lies in training. I know that we have to say a says /ă/ three times and use visual oral and tactile senses in order to rewire the dyslexic brain.

I would like to share an email from a school to a parent of a dyslexic child- I was glad to hear (your child) did well on Spelling last week! We all know he can do it, he just needs to apply himself. This came from a school in November 2018. It tells me that school staff have no idea what dyslexia is. That would be like saying that I could have beat my cancer if I tried hard enough, we all know I couldn't! We should know that it's not the child, it's the way his brain processes information.

This training is crucial to helping the dyslexic brain learn. Our brain is an organ, the body's most complex organ. You can teach a person to read because of the neuroplasticity of the brain. Think of a forest. When there is no path, it takes several walks down that path before it becomes a road. The brain can actually create new neuro-pathways, just like the path that became a road. It takes work and knowing what to do.

Dyslexia is currently a medical diagnois. Let's compare it to cancer for a moment. Without trained staff and medical doctors, I would not be alive today. This compares to teachers who are unable to reach dyslexic students. They are not taught about the different way the brain is wired and how we must retrain the brain.

The most detrimental aspect of not teaching to the dyslexic brain is the stigma that eats away at a child's self esteem. Cancer invades and can destroy things in its path, that compares to invasion taking place in the self esteem of a dyslexic person.

Dyslexia is a different way of thinking and learning. It requires a different way of teaching. 42 states already have dyslexia legislation. It is our responsibility to make changes for the 175,000 students. This legislation will be the net that will catch students the same way that my medical team collaborated for me. This legislation *is* my obtorator. If you put it into place, these students will be heard. It makes everything work. I's not the answer, but it's a start.

Thank you for allowing me to speak today. You can read my story on Caring Bridge. This speech will be posted on there as well!

Respectfully submitted by Libby Wallace, CALP, BS ECE, Wisconsin Certified Teacher

N 7035 520th Street, Menomonie, WI 54751 715 235-6459 libbypetersenwallace@gmail.com

Se blar

April 18, 2019: Support for AB 110, A Dyslexia Guidebook for Wisconsin

My name is Barbara Felix. I am a private practice tutor, working now for 10 years to help remediate dyslexia. I have tutored about 100 students, ranging in age from 4-83. These clients seek my services because without private help, they cannot succeed in school, or in jobs. My formal credential is <u>CALP</u>, <u>Certified Academic Language Practitioner</u>. My first credential is <u>mom</u>.

I raised my children in the Milwaukee suburb of Shorewood, WI and enrolled them in the highly ranked public school system there. I had no intention of challenging the educators there or anywhere in our state. I had been well served by Wisconsin schools. My firstborn had been well served by Shorewood schools. My 2nd son was poorly served by those same schools. His difference was dyslexia. What had worked for me and for others was not working for him, despite intelligence, motivation and good attendance in a good school.

His school failed him; that motivated me. I changed careers and became an advocate for dyslexic families like ours. I now own and operate the Dyslexia Achievement Center in Elm Grove, a suburb of Milwaukee. Eight of us provide the Orton-Gillingham style teaching that our clients need and are not getting in their schools. It makes all the difference; once they are taught how to crack the code of the English language, they begin to regain their confidence and ability.

It's not magic, what we do, but it is scholarly and rigorous, designed to account for every feature and pattern of the English language. School is the right place for this kind of instruction. Our method is thorough, and thoroughly supported by the science of reading, now documented by thousands of research studies across many nations. Our business has grown because Wisconsin schools have neglected the dyslexic population.

I want to emphasize that it's not the teachers' fault. There are fine teachers who would love to rescue their dyslexic students from failing, but don't know how. Our clients share their frustration when their student is told "try harder" or "rewrite it again" as if a 2nd try with the same poor tools will somehow now work better.

We hear from teachers who acknowledge they don't know how to help their students. Some of those teachers suggest that the family engage us. And several clients are themselves teachers or school administrators. They want for their own children what we all want—the tools to unlock reading for their child. At that point, it doesn't matter what the principal thinks, or what the district requires, or what DPI says about adequate instruction. If their child needs it, they will get it, and they will pay for it if they must.

But it should not be necessary to pay for private reading instruction any more than it should be necessary to pay for the air we breathe. Reading is our birthright and we are all equally entitled to it—available or not.

This inequity in Wisconsin schools is fixable; AB 110 is a step in the right direction. It is time to create the dyslexia handbook to assist DPI in providing appropriate reading instruction to our students.

Respectfully,

Barbara Felix, M.A., CALP bfinc@wi.rr.com

Good morning Chairmen Thiesfeldt, Kitchens, and members of the Assembly Committee on Education. Thank you for your consideration. My name is Christi Hunter and I am a mother of five from Twin Lakes, WI. And, since 2016, I am also a dyslexia interventionist and advocate. I am here today to express my support of the proposed bill AB 110, and the need for a Dyslexia Guidebook in the State of Wisconsin. In 2012 I found out that my oldest son is dyslexic. He is also here with me today. Sam was 11 when I found out, even though he had struggled with reading, writing, and memorizing his math facts since he had begun schooling at age 5. At the time, I believed many of the myths you yourselves may have heard or are familiar with. I thought (and was told) that he would "outgrow" his struggles, that he "wasn't trying hard enough," or that dyslexia was seeing and writing letters and numbers backwards (which he didn't do), that dyslexia meant someone could not read at all (which he could); or worse, dyslexics could not be taught to read, write or spell no matter what approach was applied. I was wrong. For the past 7 years I have done all I can to research and learn as much as I can about the truth of dyslexia and have made it my mission to share it with others. Now, as a dyslexia interventionist and advocate I have seen firsthand the powerful effect correct information and reading science has on students and their families. I have helped numerous families find the resources they need to be successful, and, when possible, have tutored students as well. Many of these students, including my own son, are depressed and anxious about their abilities, having lived with what others deem as "failure" for years. However, I have witnessed these same students' confidence soar as their reading improves when they are taught using a Structured Literacy approach. But, I am only one person. There are over 850,000 students attending Wisconsin public schools and over

60,000 teachers serving them, according to the Department of Public Instruction. As we know, Dyslexia affects as many as 5-20% of the population. So, even if only 10% of those students struggle with reading, over 85,000 students throughout the State can benefit from effective reading intervention. And according to the latest results on the State assessments, we know that number is even higher (65% of Wisconsin's 4th graders are not reading proficiently...and we also know if a student is reading proficiently by 4th grade, they often will not be able to read proficiently in 9th grade and beyond). Right now, if a parent is seeking help for their struggling student, they do not know where to turn. According to the International Dyslexia Association, there are currently only 14 dyslexia therapists/interventionists providing services in Wisconsin after school hours, while the Academic Language Therapy Association (ALTA) lists 24 qualified language therapists/practitioners throughout the State. The question begs to be answered: Who is better positioned to identify and intervene with a struggling reader when the timing is most critical (when the student is 5 or 6, rather than 10 or 11)? School districts, teachers and families NEED the guidance, resource, and support that a Dyslexia Guidebook can offer. It is critical that AB 110 be passed to provide a springboard for better awareness of dyslexia and its signs, as well as provide a resource and tool for more effective intervention for those who struggle with which is arguably the most essential skill one will ever achieve: reading.

Thank you.

Respectfully submitted, Christi Hunter, CALP Structured Literacy/Dyslexia Interventionist 548 McCole Rd. Twin Lakes, WI 53181 262-812-6616 Dear Representative,

I am writing to register my support of AB 110 to create a Guidebook on Dyslexia. This bill would require the Department of Public Instruction (DPI) to develop a guidebook on dyslexia and related conditions for parents, guardians, teachers, and administrators. This legislation will be the first step in Wisconsin recognizing the needs of students with dyslexia and related conditions. I urge you to support this bill!

The road from passion to professional is the path that leads many people to careers they hadn't planned on. I had not planned on a career in raising awareness about good reading instruction, training professional practitioners in the science of reading, supporting families whose stories are far too similar and frequent, or having to teach my son how to advocate for himself in a classroom. The career I had not planned on developed from the necessity of having to learn all I could to support my son but quickly grew to running a nonprofit organization that provides accredited training to professionals and remedial instruction to children.

My son, now a 17 year old Army National Guardsman, accepted Chippewa Valley Technical College welding student, and honor roll high school senior, was evaluated and diagnosed with dyslexia in first grade. We were told by school administrators he was not far enough behind to qualify for support or services and based on their experience he would not qualify until about third or fourth grade. They told us essentially that **he had to fail more before they could intervene**. Our son was the victim of a broken system and that was not and is not acceptable for him or any other child!

We have been blessed throughout our son's academic career to have partnered with wonderful teachers who were willing to learn more. You see, my husband and I left that dreadful meeting with school personnel and decided that we had to accept the challenge of studying and learning everything we possibly could so that we would be better equipped to support our son and his teachers. His teachers did not want to see him fail any more than we did but they did not have the tools, resources, or knowledge to teach him to read and understand the structure of our rich language. They, by their own admission, did not know what to look for as characteristics of dyslexia nor did they know the depth of what they had not been taught as educators about reading instruction until they were exposed to more.

Unlike many families, I had the flexibility and good fortune to be able to pursue further education in this endeavor. Unfortunately, only one university course in the entire reading specialist program even mentioned dyslexia and that was to dismiss it completely as something real. With the support of research and science, I assure you it is very real! Through conferences, webinars, books, journals, mentoring, and so much

more I learned more and in an effort to support my son's teachers, I shared as much as they were willing to take in.

I now work with teachers throughout northwest Wisconsin who are fully aware that they do not have the tools, resources, and knowledge to support their struggling readers but want to do better. Sometimes that is with the support from their school administrators and sometimes it is not but resoundingly it is because these teachers want to do better by their students. Emphatically, upon learning foundational information about the structure of the language and the science of teaching reading, they are grateful for the deeper understanding and ability to apply it with children but question how they could ever have taught something they themselves were never taught.

The accredited instruction they get gives teachers the tools to help their students to be successful academically. **Being taught to read is a civil right and every child deserves the right to be taught how to read.** This Guidebook is a step in the right direction for raising awareness and understanding of what dyslexia is, how to identify it, and how to implement science-based reading instruction that prevents children from becoming struggling readers in the first place. There is no logical reason for children to struggle in reading based on the research and science of what good reading instruction includes!

Wisconsin is one the last states to implement legislation that would support teachers and children in reading best practices, which might explain why Wisconsin fairs so poorly compared to other states on national standards and scores. It is time that Wisconsin moves forward with dyslexia legislation like the Guidebook that would help improve reading instruction for all children. For too long, students with dyslexia have struggled due to misinformation regarding identification and treatment. This bill is at least one step in the right direction for all of Wisconsin's students. I urge you to support this legislation.

Warmest regards,

Dr. Tammy Tillotson 17343 49th Ave. Chippewa Falls, WI 54729 715.720.0448 Petition in support of **AB 110: A Dyslexia Guidebook for Wisconsin and AB 50: A Dyslexia Specialist**. We encourage our Wisconsin Legislation to vote in favor of these two bills related to dyslexia.

NAME ADDRESS Lyle N Korner Tr. 3605 White Brich Cl. Ear Claire WI 3470/ Julanta 19022 75" Ave, Englistalle Egg 29 James W. Trowbridge 3415 MILETruy Ct, Eau Clase, WISYRI Kennith Olm 2307 Fecan Phily Marsh Field WI 54449 MICHAEL PLMe Al Me Catterly 624 N. GAWIN AV. MASHAIED WI.SA449 5000 Danston E6767 871 TAVE COLFAX WI SY730 Michael A, Aberrathy 503 5, Beach Dr. Alton NI 54720 LOREN SARNUS 844 BRASYLA NOW RICHMANDE IN Dowid Mulberg 1410 Highland Auc, Eauchaire wit 54701 Brajamin Cornell 800 Main St Apt B Baldum Wi 54002 Deen 935 European Rel WHASPA MJS4403 StevenLasure 3715 Forest Knoll Dr Ean Clairew 154701 Denoli Il for Schwartz 9544 20th St Colfar 54730 Tim DUCKLEY 1816 FENWICK HUE BUCKALARE WA Fing Lord 204 Skyline Dr. Ean Claire, W1 54703 John Nobeleicle 1850 WRINCE ST Chippenn Falls 54729 BEARIN L. BERG 513 FALLTS E.C. U. 54703 DANBOURNSSA 70695 CTTHUT AJEON RIMPE SHEY LAWRENCE GANSKE 1010 E. Fillmore dur. Ean Chin, wi strol JOHNA T SUDBRINK EFADO SUINIC OR AUGUSTIA LUE SATZZ DON MILLEN 1115 NZIST SUPENION WY 54550 Tim GAD 1146 blen 11 Eau Clarke WI 5470) har - Distigh Larson 3323 Seymour Rd # 30 Enclaire Ale Kein 1622 Prederics; EVANCLAKE WI David Jacobson 18de 30th Hve, Baldwin WI 54602 Nama 221 Minnesota ST. Eur Clair WI 54703 3727 GADDES CT EAU CLAIRE 54701 708 IVALNUT ST MARIFILION WI \$4448 ben Tomer 1/23 Avanto MR MUSIME SUYSTS

500 Eda Hore Fedber (by) Vit 3617 5 070 RJ D 54864 States Bate mile 1 H. Hainsheary N37121 Witt Hill Rd. Whitehall, WI Kystin Sosalla 11013 Sunvise In Zan Churie, WI 54703 Julie Stang 3206 Eisenhower St Fauchaire, WI 54701 usan Ulapar 2934 Neptune Are Eaudan w154703 my opposite 9073 County Hwy N, Chippelva Fult, tut Wood JIG W GRANT AVE EANCLAINENT SUTOI Inclu Erdeman NI3462 CHIRD M Those WI 54771 Hexandra Gen 3046 Abbe Hill Dr. Ean Clair, WI 54703 erscher 2906 Winsor Dr. Eau Claire , WY 54703 rula Petropuship 2520 PinekidgeRd 3, Eau Claire WI 54701 N33391 Bisek Rd Independence WI SHILL ETITAL SHILL mmhu Nari 1921 7th St. E.C., WI 54703 Knue te la Hon 2020 Declaration Dr. E.C. WI 54703 athleen 11 Janke 1428 Frederic St. Eau Claire W154701 3133 Midway St. Eas Claire, WI 54703 Low Boss 4BU Spring Field Dr Ean Claire NI 54701 5732 ISI ST Chippewee falls W belungter 121 Witt Hill Rd. While Juli Wi \$4713 (mendano) 1300 NIVOTHAVE C. F. WI/S4729 Wilnin 2906 Winsor Dr Eau Claire WI 54763 1707 Hillsdale Rd Eau clare wit 54703 mbin Aelson 1724 Main St. Eau Claire, WI 54701 474 FrenthillsRd RyunFalls, WI 5402/2

someone how has dysteris I will know. 3. How does this information fit in with my prior knowledge of the person? I uset watch the Sonny and Cher show. I watched cher all my life. 4. In what ways can I use this information? If someone asked me sumething about cher or if I know 2. Does the author present facts or opinions? that Cher Was dystexia. Because I am dystexis and if she can make it so can I. am dystexis 1. How do I feel about what I read? I felt good to know I seen a lot of facts about cher. えっら MISCMS IN DOC Show WORK

11-26-04 12-15-of they new I could not read or write so they did wat they wanted just like the last time. I may know some things about the law but not as much as I should have. wore I know that the state did me rong, they tolk advantage of me. I am learning all about Government and the law, and wat I have learned is that I mad a mostak. WISCONSIM DOC Student WORK

My name is Jayne Black and I have dyslexia.

My long awaited diagnosis did no come until I was in my

30's at the same time my son Sam was diagnosed when he was in second grade. He got diagnosed because I as a parent fought to make sure I found out what was wrong - why he could not learn how to read.

As a parent of a dyslexic child and a dyslexic person myself I feel I have been through every possible emotion, challenge and situation in life. I could of chose to be bitter but I chose to be a voice for children a voice I did not have

I am a 23 year advocate for children with dyslexia and the President of CKR a program that brings awareness to dyslexia and the creative strengths dyslexic children have.

Almost Every day I hear from parents who are overwhelmed with and concerned because their children are struggling in school and they are completely frustrated and confused as to how their school is supposed to help them even after countless efforts to try and work with them. I also look in to the eyes of their children. I work a full-time job and volunteer over 500 hours a year to help families in our state because I am devoted and the NEED is so great!

Navigating through the school system with a child with dyslexia is exhausting and confusing. Especially because many schools refuse to use the D word. A word that empowered me with the knowledge that NO----I was not stupid but that I had a learning disability that needed the right type of intervention and teaching so I could of been successful in school and life.

Parents reach out to me because I am very bold about having dyslexia -- I am doing everything I can to give these children what I did not have because this is at most "AT RISK" population of kids for everything negative. we are talking about 1 in 5 kids with only 30 percent who get diagnosed during their school years.

IMAGINE if not only they but the 70 percent who are wondering around even more confused could get knowledge that would change their lives!!

They would not loose their self esteem at such a young age – be the most at risk population of Youth--- Instead they would LOVE their dyslexia and the creative strengths they bring to our world -- they would go to college perhaps even create another amazing invention or another Disney land.

I ask you to be a voice!!!

Please empower families with the knowledge they need by empowering with a very important piece of the puzzle a guidebook to help them navigate a FREE and appropriate education which is every child's right.

Jayne Black President of Creative Kids Rock.org 1138 Trailwood Drive, De Pere, WI 54115 Jayne.black@gmail.com April 18, 2019

Dear Representative Thiesfeldt and the Education Committee members,

My name is Susan Garcia Franz and my daughter, Pacha Garcia Franz has dyslexia. Our journey has been long finding out she has dyslexia. It was not diagnosed until she was in seventh grade and after we had many difficulties within the school system. Our process and difficulties with dyslexia are not unique. My daughter has had a reading specialist and often a math specialist since she in second grade. She had been receiving interventions that were allowing her to continue to the next grades in school. She comes from a family with two full-time college educated parents that are bilingual. We read books and taught letters and numbers and symbols from an early age. We did all the things you do to prepare your child for school. She continued to struggle despite our continued efforts to help her. We didn't know what to do by the end of the fifth grade but knew how challenging getting through the school year was for her. We looked to private tutoring and ended up at Learning Rx that was one of the only options at the time in our area. We spent a lot of time and money trying to give her the tools she needed to succeed but it wasn't the right tool for her. She had dyslexia and needed curriculum that helped her with dyslexia.

When we were working with the school district and got the diagnosis, we were not told about a 504 plan and the process to get that. We ended up with a pseudo-accommodation plan for eighth grade and when we had executive functioning problems that arose, we found out we didn't have a 504 plan. It should not be this complicated for parents and students to get in place what kids need to succeed. We were the parents that did not give up on our child and didn't move to another district and didn't put her in a private educational setting. She had a right to a public education that gave her the educational tools needed to read and write at her grade level. She is now a junior at Neenah High School and she has an IEP and a caseworker. She will graduate next year. Giving parents the tools they need to help their children succeed is the very least this state can do for ALL our children. We have a lot more work to do to help children with dyslexia and many other states have bypassed Wisconsin in their work to help the children of their states. Please do not let this opportunity pass you by. Vote for AB110.

Sincerely,

Susan Garcia Franz 1790 Wendy Way Neenah WI 54956 susanfranz@hotmail.com



Dsyilexa

A fiend who has developed to me now she envicreepes madleg. She can read, but it these a lot of choosenetrin, and the eerits seems to "jump anound".

I impresebmed ran-deg abuot timp/oy/ogera. Widoun't it be psolstoe to do it liftikinetadey on a wteisbe with ju Japvsroait? Sirve it would.

Feel like making a borkimapket of tins or smhotneig? Fork it on gthiub.

Deisxyla is crieeactazhrd by dffilticuy with lennraig to raed fitelnuy and with aactucre cromheopisnen dsitepe normal icitienegine. Tihs idneculs difcliutfy with pnghloiacool aweserans, pooocghlanil ddcoieng, pesnicsorg speed, opitorgrhhac cdnoig, adoiruty shrot-trem mremoy, laaugnge skilis/vbrael copmhereionsn, and/or riapd namnig.

Detaomnevelpl rneiadg didseror (DRD) is the most cmmoon lrinneag dlisbtilay, Dlyexisa is the most rnezgoecid of riadeng drseordis, hveweor not all rnediag drdrsoeis are lneikd to deiylxsa.

Smoe see dsxellya as dtisncit from rdeanig deitlouffis musitelg from other cesuas, souh as a non-neuogoraioll deiencofiy with vision or hrenaig, or poor or iantudaequi rieadng irtticsunon. Tehre are three ppoersod ontivgioe sepbutys of diyxelsa (alturody, vsaiul and annetittaol), alutoghh illadvndul cases of disexiya are better exianepid by sfollepc unyindlerg nguopsihocyricoeal delitfos and co-ocrmiuog lairenng diasielibtis (e.g. ateonttin-doleift/hrievotayptiy doresdir, math daibsitliy, etc.). Ahogituh it is cirnsdoeed to be a roivepete Igagaune-based lernanig ditslibai

The code, written by Victor Widell, can be applied to any web page and scrambles the letters around, making it appear as they would to someone with dyslexia. An example of the code working on a passage of text about dyslexia is shown above

He then posted it on Git Hub, a website developers use to share code, with an example

THE STATEHOUSE at the EDGEWATER

ELON MADE

Cacual Lakocido Dining

Claudine Kavanagh 5166 Buttonbush Circle Fitchburg, VVI 53711 617) 447.5789

Thank you for your time today. My child has dyslexia. As a family, we were completely unprepared for this experience as I reflect back on dropping off a happy and healthy kid for Kindergarten. Our family are strong supporters of community-based public schools. We did everything the teachers asked to promote literacy within our home. We read at home and visited the library twice a week. When our son failed to read by the end of third grade, our son's teacher told us not to be very concerned. Our son was "so smart" that he would "catch up."

Yet the situation did not improve. By fifth grade, the emotional impacts of reading failure had taken a toll on our child's self-esteem. We had him evaluated by a neuropsychologist to discover his oral vocabulary and conceptual understanding was five grades ahead. His ability to read was simultaneously five grades behind, as if he had never attended school. He began seeing a private tutor and attending an academic summer program for kids with dyslexia. These programs in phonics helped him 'crack the code.' It was what we had expected the school to provide, and they could not. His well-intentional and caring teachers in the classroom were using approaches that are inappropriate for his dyslexia. He started to gain literacy skills once he had access to appropriate curriculum, which was only available to him outside the school setting.

Incredibly, we have had to leave the public schools to access the education our son needs. Statistically, there are dyslexic learners like my son in every classroom in every school. We hope your support of this bill will give students and educators the support they both need.

Anxiety and Depression in Children With Nonverbal Learning Disabilities, Reading Disabilities, or Typical Development

HAMMILL INSTITUTE TON DISABILITIES

Journal of Learning Disabilities 2016, Vol. 49(2) 130–139 © Hammilf Institute on Disabilities 2014 Reprints and permissions: sagepub.com/journalsPermissions.nav DOI: 10.1177/0022219414529336 journaloftearningdisabilities.sagepub.com

Irene C. Mammarella, PhD¹, Marta Ghisi, PhD², Monica Bomba, PhD³, Gioia Bottesi, PhD², Sara Caviola, PhD¹, Fiorenza Broggi, PhD³, and Renata Nacinovich, PhD³

Abstract

The main goal of the present study was to shed further light on the psychological characteristics of children with different learning disability profiles aged between 8 and 11 years, attending from third to sixth grade. Specifically, children with nonverbal learning disabilities (NLD), reading disabilities (RD), or a typical development (TD) were tested. In all, 15 children with NLD, 15 with RD, and 15 with TD were administered self-report questionnaires to assess different types of anxiety and depression symptoms. Both NLD and RD children reported experiencing more generalized and social anxiety than TD, the NLD children reported more severe anxiety about school and separation than TD, and the children with RD had worse depressive symptoms than those with NLD or TD.

Keywords

nonverbal learning disability, reading disability, anxiety, depression

The term *learning disability* (LD) or *specific learning disorder* (*Diagnostic and Statistical Manual of Mental Disorders, Fifth Edition; DSM-5*; American Psychiatric Association, 2013) has been used to describe children with difficulties in learning and using academic skills related to reading decoding, reading comprehension, spelling, written expression, and calculation and mathematical reasoning in children with average or above-average intelligence associated with a poor school performance. One well-known subgroup of individuals with LD includes those with impaired reading skills, such as children with reading disabilities.

A separate, less thoroughly studied subgroup of children with LD comprises cases with a neuropsychological profile characterized by poor nonverbal abilities—a disorder not recognized in the actual classification systems (*DSM-5; ICD-10*; World Health Organization, 1992), known as *nonverbal learning disability* (NLD; Mammarella & Cornoldi, in press; Rourke, 1995). Although the majority of researchers and clinicians agree that the profile of NLD clearly exists (but see Spreen, 2011, for an exception), they disagree on the need for a specific clinical category and on the criteria for its identification (see Fine, Semrud-Clikeman, Bledsoe, & Musielak, 2013, for a critical review).

Children with NLD usually show a discrepancy between their levels of verbal and visuospatial intelligence and have major problems with visuospatial working memory (Cornoldi, Rigoni, Tressoldi, & Vio, 1999; Mammarella & Cornoldi, 2005), and with psychomotor and visuo-constructive tasks, within a context of well-developed psycholinguistic skills. Children with NLD are also impaired in some aspects of academic learning, and especially drawing, science (Pelletier, Ahmad, & Rourke, 2001), arithmetic (Mammarella, Lucangeli, & Cornoldi, 2010; Rourke, 1993; Venneri, Cornoldi, & Garuti, 2003), and comprehension of spatial descriptions (Mammarella et al., 2009).

The impairments in children with reading disabilities (RD), on the other hand, concern either their accuracy or their speed. Phonological deficits in children with RD have been extensively reported in the literature (Helland & Asbjørnsen, 2004), although there is conflicting evidence regarding their performance in visuospatial tasks (Kirkwood, Weiler, Bernstein, Forbes, & Waber, 2001; Lipowska, Czaplewska, & Wysocka, 2011).

Corresponding Author:

¹Department of Developmental and Social Psychology, University of Padova, Italy

²Department of General Psychology, University of Padova, Italy ³Child and Adolescent Neuropsychiatry Clinic, San Gerardo Hospital in Monza, University of Milano-Bicocca, Italy

Irene C. Mammarella, PhD, Department of Developmental and Social Psychology, University of Padova, Via Venezia 8, Padova, 35131, Italy. Email: irene.mammarella@unipd.it

Both the above-mentioned subgroups with LD therefore function poorly at school and fail to achieve the expected results. These features can become a risk factor for the onset of current and long-term psychological maladjustment. In particular, difficulties at school have been shown to increase the risk of individuals suffering from internalizing disorders, such as depression, anxiety, and social withdrawal (Bandura, Pastorelli, Barbaranelli, & Caparra, 1999; Feng, Zhang, & Wang, 2005; Grover, Ginsburg, & Ialongo, 2005; Sideridis, 2007; Sourander et al., 2005). It is well known that students with LD may be at a greater risk for developing mental disorders because they tend to have lower selfconcepts and are less socially accepted and more anxious than their peers without LD (Heath & Wiener, 1996; Howard & Tryon, 2002; Margalit & Shulman, 1986). Moreover, co-occurring conditions such as depression may exist among students with LD (Bender & Wall, 1994; Newcomer, Barenbaum, & Pearson, 1995). The results of a meta-analysis conducted by Maag and Reid (2006) revealed that although students with LD obtained higher depression scores than their peers without LD, the degree of difference may not be sufficient to place them in the clinical range for a major affective disorder.

Anxiety disorders are the most common childhood and adolescent mental health disorders (Bosquet & Egeland, 2006), with a median onset age of 11 years (Kessler et al., 2005). Social anxiety is characterized by social incompetence and social isolation, which are often, though not always, associated with LD (Tur-Kaspa, Weisel, & Segev, 1998; Wiener & Sunohara, 1998). In the literature on LD different research have investigated the presence of anxiety symptoms. Studies have reported elevated stress and anxiety levels for students with LD. Higher rates of schoolrelated stress and anxiety were found in samples of school-identified children (Geisthardt & Munsch, 1996) adolescents (Wenz-Gross & Siperstein, 1998). and Moreover, Fisher, Allen, and Kose (1996) found higher rates of state and trait anxiety among boys with LD. Moreover, over time, the impact of persistently heightened anxiety on academic achievement may contribute to negative educational outcomes, such as failure to complete high school and failure to enter college (Kessler, Foster, Saunders, & Stang, 1995; Van Ameringen, Mancini, & Farvolden, 2003). In a meta-analysis carried out by Nelson and Harwood (2011), a medium effect size was found, meaning that approximately 70% of students with LD experience higher anxious symptomatology than do non-LD students. This finding suggests cause for concern that students with LD are at risk for potentially problematic anxietyrelated distress. Wilson, Deri Armstrong, Furrie, and Walcot (2009), analyzing a large data set of people aged between 15 and 44 years, found that people with LD had more than 2 times the odds of reporting an anxiety disorder, with a prevalence rate around 20% for 15- to 21-year-olds and around 30% for 30- to 44-year-olds.

Although a judge number of research have analyzed depression and anxiety symptoms in students with general LD, only a few studies have focused on the psychological characteristics of children with NLD or RD. Research on the social problems and social skills of children with NLD is rather limited, but findings generally point to difficulties in understanding social interactions, and to social perception problems (Forrest, 2007; Myklebust, 1975; Ozonoff & Rogers, 2003; Woods, Weinborn, Ball, Tiller-Nevin, & Pickett, 2000; Worling, Humphries, & Tannock, 1999). For instance, Semrud-Clikeman, Wałkowiak, Wilkinson, and Portman Minne (2010) tested social perception in children with NLD, Asperger syndrome (AS), or attention-deficit/ hyperactivity disorder (ADHD), comparing them with typically developing (TD) children. The NLD and AS groups had greater difficulty in understanding emotional and nonverbal cues than did the TD group. A limited ability to interpret social feedback may facilitate unpleasant experiences with peers, and this may lead to sadness and social withdrawal (Little, 1993; Rourke & Tsatsanis, 2000).

Findings regarding internalizing symptoms are inconsistent, however. Although NLD children experience some degree of acting out or other externalizing disorders during their early childhood, as they grow older they risk developing internalized forms of psychopathology (Casey, Rourke, & Picard, 1991; Forrest, 2004; Little, 1993). It is not surprising that the incidence of depression and suicide seems to be high among older children and adults with NLD (Gross-Tsur, Shalev, Manor, & Amil, 1995). On the other hand, a study comparing NLD children with other children who had verbal LD and with controls who had psychiatric symptoms could find no differences between these groups (Petti, Voelker, Shore, & Hayman-Abello, 2002). Semrud-Clikeman et al. (2010) examined NLD, AS, ADHD, and TD children and again found no differences between the NLD cases and the other groups in terms of anxiety and depression symptoms.

As in NLD, so too in RD research has identified a higher risk of internalizing problems (Maughan & Carroll, 2006), although externalizing disorders, such as ADHD, seem to be the most frequently observed comorbidities (Carroll, Maughan, Goodman, & Meltzer, 2005; Willcutt & Pennington, 2000). Symptoms of anxiety and depression have been reported (Dahle, Knivsberg, & Andreassen, 2011; Stringer & Heath, 2006), consistent with ICD-10 (World Health Organization, 1992), which describes emotional problems, low self-esteem, and problems with peer relationships as being features commonly associated with RD. To give an example, an epidemiological study in the United Kingdom (Carroll et al., 2005) found that 9.9% of children with RD had a comorbid anxiety disorder, indicating a significantly higher prevalence than among children with no literacy difficulties (3.9%). Willcutt and Pennington (2000) looked for psychological problems in a sample of twins in which one of each pair had RD and found that the children with RD reported higher rates of anxiety than their unaffected siblings. Prior, Smart, and Oberklaid (1999) also identified clinical symptoms of anxiety in 10- to 11-yearold RD children, Margalit and Zak (1984) found that children with RD had more severe social anxiety than their TD counterparts, and Dahle et al. (2011) reported that children with dyslexia suffered from more severe somatic complaints and anxious symptoms. Conversely, Boetsch, Green, and Pennington (1996) and Miller, Hynd, and Miller (2005) were unable to detect any differences in the anxiety levels of RD and TD children.

As for depressive symptoms in children with RD, DSM-5 (American Psychiatric Association, 2013) points to the possibility of high percentages of comorbid depression. Boetsch and colleagues (1996) and Willcutt and Pennington (2000) found that children with RD endorsed significantly more symptoms on the Children's Depression Inventory (CDI; Kovacs, 1982) than normal controls, suggesting that they experienced more depressive symptoms such as selfblame, low energy, and suicidal ideation. Dahle et al. (2011) compared RD and TD children in self-report measures, likewise finding more depressive and withdrawal symptoms in the former than in the latter. In a longitudinal study on males aged between 7 and 10 years from a community sample, Maughan, Rowe, Loeber, and Stouthamer-Loeber (2003) examined the extent to which children with RD showed high levels of depressed mood. They found the risk of depressive symptoms higher the more severe and persistent the children's reading difficulties, but only for the younger ones at their initial assessment, not for those already in their teens. On the other hand, Heiervang, Stevenson, Lund, and Hugdahl (2001), and Miller et al. (2005) reported finding no differences in self-reported depression levels between RD children and healthy controls.

In light of the limited and inconsistent research findings on internalizing symptoms in NLD, the present study was designed to investigate anxious and depressive symptoms in children with NLD, comparing them with RD and TD children. To do so, the children's internalizing symptoms were assessed using self-report questionnaires. To the authors' knowledge, such a comparison has not been drawn before. Our research focused on seeking any differences between children with NLD, RD, and TD in terms of depressive and different types of anxious symptoms. In particular, we tested generalized, social, and separation anxiety, as defined by the *DSM-5*; moreover, school-related anxiety was investigated, due to the academic impairments of both children with NLD and those with RD.

Method

Participants

months, SD = 14.33) had a clinical diagnosis of NLD and 15 (8 male, 7 female; mean age 125.00 months, SD = 17.06) had a clinical diagnosis of RD, established at a clinic specializing in child and adolescent neuropsychiatry. The remaining 15 (10 male, 5 female; mean age 116.67 months, SD = 17.46) were TD children attending the third to sixth grades at school (like the two clinical groups) and were tested at local schools. In particular, the TD group consisted of children matched for age, schooling, and socioeconomic status, with no reported academic difficulties.

All the children spoke Italian as their first language, and none had any primary visual or hearing impairment, or neurodegenerative condition.

Although the NLD and RD children had been referred by a neuropsychiatry clinic and their diagnosis had been clinically confirmed, we also ensured that the groups met further specific criteria (see Mammarella & Cornoldi, in press). The inclusion criteria for the NLD group were (a) a diagnosis of NLD; (b) age between 8 and 11 years; (c) a verbal intelligence quotient (VIQ) on the Wechsler Intelligence Scale for Children (WISC-III; Wechsler, 1991) at least 15 points higher than the performance intelligence quotient (PIQ); (d) a difference of at least 15 points between the student's verbal and perceptual/visuospatial intelligence, that is, a higher score for the verbal comprehension index (VCI) than for the perceptual organization index (POI) on the WISC-III scale; (e) visuo-constructive difficulties (i.e., < 30th percentile in a visual-motor integration test); and (f) poor academic performance in mathematics and good reading decoding skills (i.e., around average performance for speed and/or accuracy on reading aloud compared with a normative sample).

The inclusion criteria for the RD group were (a) a diagnosis of RD established using standardized procedures, (b) age between 8 and 11 years, and (c) impairment in reading decoding (speed in reading aloud) and in learning tasks that involve processing verbal material.

The exclusion criteria for both groups (NLD and RD) were (a) treatment with psychoactive drugs; (b) fulfillment of the diagnostic criteria for clinically significant autistic syndrome or AS, developmental coordination disorder, or traumatic brain injury; (c) a history of seizures in the previous 2 years; (d) total IQ less than 80 (see Note 1); (e) poor socioeconomic conditions; and (f) medical illness requiring immediate treatment.

Materials

Screening Tests

Reading, arithmetic, and IQ screening tests were administered to ensure that the groups met the above criteria. The assessments included the battery in the latest standardized Italian version of the WISC-III (Wechsler, 1991); the MT battery (Cornoldi & Colpo, 1998), which measures children's reading skills; and the AC-MT standardized

The total sample comprised 45 children aged 8 to 11 years. Of the children, 15 (8 male, 7 female; mean age 120.13 arithmetic battery (Cornoldi, Lucangeli, & Bellina, 2002), which measures children's arithmetical abilities. Children in the TD group completed only the Vocabulary and Block Design subtests (Wechsler, 1991) to estimate their general cognitive abilities. The screening measures were included to ensure an appropriate group matching: Children with NLD, RD, and TD were matched for reading comprehension and vocabulary; children with NLD were matched with TD for reading decoding skills; children with RD were matched with TD for block design; and children with NLD and RD were matched for arithmetical skills.

Reading test (Cornoldi & Colpo, 1998). The children's reading skills were measured considering three aspects: (a) reading speed, which is considered the best indicator of an RD for transparent languages and is measured by calculating the mean number of syllables per second that the child reads aloud; (b) accuracy, consisting of the number of mistakes the child makes while reading aloud (using the same text as for measuring reading speed); and (c) comprehension, established from the total number of correct answers given in a multiple-choice questionnaire with no time constraints concerning the meaning of a passage; during the comprehension test, the child reads the passage silently and can refer to the passage at any time while answering the questions.

Arithmetic test (Cornoldi et al., 2002). The AC-MT standardized arithmetic battery measures the following: (a) accuracy in written calculations, which involves children completing a list of calculation problems (addition, subtraction, multiplication, and division); (b) accuracy in mental calculations, which involves children finding solutions for multiple-digit calculation problems; and (c) speed in seconds in performing these mental calculations.

Self-Report Questionnaires

Children were administered two self-report questionnaires: the *Self-Administered Psychiatric Scales for Children and Adolescents* (SAFA; Cianchetti & Fancello, 2001), which assesses different types of anxious symptoms, and the CDI (Kovacs, 1982; Italian validation by Camuffo, Cerutti, Lucarelli, & Mayer, 1988; see also Nacinovich, Gadda, Maserati, Bomba, & Neri, 2012).

SAFA anxiety questionnaires. This is a self-report measure assessing anxious symptoms in children and adolescents aged from 7 to 18 years old. The SAFA anxiety questionnaire contains 42 items with multiple-choice answers. It consists of four subscales measuring four distinct components of anxiety, that is, Generalized (irrational worries about everyday things), Social (fear in social interactions and regarding what others think of them), Separation (worrying excessively about being separated from home or from people to whom the individual has a strong emotional attachment, such as a parent), and School (fear and worry concerning academic activities and achievement). Cronbach's alpha values ranged between .86 and .90 for the 8- to 10-year-old children and between .89 and .91 for those aged 11 to 13.

CDI. This is a brief self-report questionnaire that helps to assess cognitive, affective, and behavioral symptoms of depression in children and adolescents aged from 7 to 17 years old. The CDI contains 27 items, each consisting of three statements, and respondents are asked to choose which answer best describes their feelings over the past 2 weeks. The total score varies between 0 and 54. The original version has a good internal consistency: Cronbach's alpha values range between .70 and .87 (Kovaks, 1982); the Italian version has an acceptable internal consistency (alphas between .69 and .76; Camuffo et al., 1988).

Procedure

Participants were tested in two separate individual sessions in a quiet room: In the first one children were presented with the WISC-III test, whereas in the second session participants performed both reading and arithmetic tests and the self-report questionnaires (SAFA anxiety and CDI).

Results

Statistical Analyses

One-way ANOVA were run. Post hoc analyses were corrected with Bonferroni adjustment for multiple comparisons, and effect sizes (Cohen's d) were calculated. The magnitude of the effect sizes was interpreted according to Cohen's (1988) guidelines (d = 0.20 small, d = 0.50 medium, d = 0.80 large).

Screening Tests

Table 1 summarizes the IQs and visuo-constructive, reading and arithmetical performance of the children in the NLD and RD groups.

The NLD, RD, and TD children did not differ significantly in terms of mean age, F(2, 42) = .49, p = .61, Cohen's d = 0.19 (small), but they did differ in reading speed (i.e., mean number of syllables read aloud per second), F(2, 42)= 34.55, p = .0001, Cohen's d = 2.61 (large). The NLD and TD children had similar reading speeds (p = .99), whereas the RD children were slower than either the NLD (p =.0001) or the TD (p = .0001) groups. The groups also
Table I. Demographic and Clinical Characteristics of Children With Nonverbal Learning Disabilities (NLD), Reading Disabilities (RD), and Typical Development (TD).

	NL	D		RD	1	ГD
Characteristics	м	SD	М	SD	М	SD
Age	121.40	14.31	124.67	17.28	118.67	17.62
General cognitive skills						
Vocabulary	11.27	2.60	9.80	2.96	11.87	1.87
Block design	6.33	2.55	10.93	2.49	11.00	2.39
Verbal IQ	100.47	10.49	98.93	11.88	٢	JA
Performance IQ	77.60	18.45	104.47	11.00	Ν	JA
Total IQ	87.80	9.99	101.73	11.05	Ν	١A
VCI	102.1	11.07	99.47	14.49	Ν	JA
POI	76.57	7.13	102.20	11.82	Ν	١A
Visuo-constructive skills						
VMI test (percentiles)	19.80	17.11	NA		Ν	١A
Reading abilities						
Speed (syllables/second)	3.12	0.72	1.37	0.76	3.15	0.49
Accuracy (z scores)	0.42	0.45	-2.07	0.73	0.19	0.32
Comprehension (z scores)	0.18	0.86	0.08	1.02	0.14	0.61
Arithmetical skills						
Written calculation (z scores)	-1.42	1.45	-1.37	0.96	0.26	0.51
Accuracy on mental calculation (z scores)	-1.15	1.05	-1.04	0.74	0.03	0.59
Speed on mental calculation (z scores)	1.01	1.22	1.12	1.01	-0.16	0.59

Note. NA = not available; POI = perceptual organization index; VCI = verbal comprehension index; VMI = visual-motor integration test (Beery & Buktenica, 2004).

differed in terms of reading accuracy (measured on z scores), F(2, 42) = 56.38, p = .0001, Cohen's d = 3.12 (large). Here again the NLD and TD children were similar (p = .77), whereas the RD children were less accurate than either the NLD (p = .0001) or the TD children (p = .0001). The three groups revealed no differences in reading comprehension skills, F(2, 42) < 1, Cohen's d = 0.37 (small).

As for their arithmetical skills, the groups differed in written calculation, F(2, 42) = 12.64, p = .0001, Cohen's d = -1.61 (large), that is, the TD performed better than either the NLD (p = .0001) or the RD (p = .0001), whereas the two clinical groups were similar (p = .99). The same pattern emerged in the tests on mental arithmetic-both for accuracy, F(2, 42) = 9.59, p = .01, Cohen's d = -1.37 (large), where the TD children differed from both the NLD (p =.002) and the RD (p = .001), whereas the latter two were similar (p = .99), and also for speed, F(2, 42) = 7.89, p =.001, Cohen's d = 1.19 (large), again with the TD children differing from both the NLD (p = .006) and the RD (p =.003), whereas the two clinical groups were similar (p =.99). Finally, the TD did not differ from the RD in the Block Design subtest of the WISC-III scale, F(2, 42) = 17.46, p =.0001, Cohen's d = -1.88 (large; NLD < RD, p = .001; NLD < TD, p = .001; RD = TD, p = .99). The three groups' performance was similar in the Vocabulary subtest as well. F(2, 42) = 1.49, p = .24, Cohen's d = 0.58 (medium).

Self-Report Questionnaires

Preliminary ANCOVA were run using PIQ and reading speed as covariate variables. Since these covariate variables were never significant and did not change the pattern of results, they were disregarded in the analyses.

Different patterns emerged from the different subscales in the SAFA Anxiety Questionnaire. On the Generalized Anxiety subscale, F(2, 42) = 7.84, p = .0001, Cohen's d =1.42 (large), both the NLD and the RD had higher scores than the TD children (p = .001, p = .03, respectively), whereas the NLD and RD did not differ (p = .65). Similarly, on the Social Anxiety subscale, F(2, 42) = 6.10, p = .005, Cohen's d = 1.22 (large), the NLD and RD both had higher scores than the TD (p = .005; p = .04, respectively), and the former two groups (NLD and RD) did not differ (p = .99). But when it came to Separation Anxiety, F(2, 42) = 4.25, p = .02, Cohen's d = 1.06 (large), the NLD group scored higher than the TD children (p = .02), whereas the RD children did not differ from either the NLD (p = .44) or the TD (p = .44) groups. Finally, as concerns School Anxiety, F(2, -1)42) = 6.14, p = .005, Cohen's d = 1.26 (large), the NLD group again scored higher than the TD children (p = .004), whereas the RD group differed from neither the NLD (p =.09) nor the TD (p = .70; see Table 2).

The results of the CDI showed that the groups had different depression scores, F(2, 42) = 16.58, p = .0001, Cohen's

Table 2. Means and Standard Deviations for Scores Obtained in the Self-Administered Psychiatric Scales for Children and Adolescents Anxiety Questionnaires and in the Children's Depression Inventory (CDI) by Children With Nonverbal Learning Disabilities (NLD), Reading Disabilities (RD), and Typical Development (TD).

	NLD		R	D	TD	
	м	SD	М	SD	М	SD
Generalized Anxiety	6.60	3.04	5.20	4.06	2.27	1.53
Social Anxiety	5.73	4.52	4.67	4.04	1.33	1,39
Separation Anxiety	5.40	4.42	3.43	3.66	1.73	1.62
School Anxiety	6.07	4.94	3.33	2.61	i.87	1.41
CDI	12.80	5.41	30.33	17.89	7.80	5.50

d = 2.00 (large): Children with RD had higher scores than NLD (p < .0001) or TD (p < .0001) children, whereas no differences emerged between the groups with NLD and TD (p = .69; see Table 2).

Discussion

The aim of this research was to seek to identify different profiles of internalizing difficulties (e.g., anxiety and depression) in children with NLD compared with RD and TD individuals because too few and inconsistent results have been published on the internalizing problems of children with NLD (and RD). In particular, we explored the differences between these groups in terms of different types of anxiety (generalized, social, separation, and school-related).

Our results indicate that children with NLD and RD have more anxious symptoms than TD children. Both the clinical groups reported higher levels of generalized and social anxiety than the TD group, in agreement with the literature (Burkhardt, 2005; Goldston et al., 2007; Willcutt & Pennington, 2000). High levels of generalized anxiety might be due to the feeling that things are beyond their control, something frequently experienced by children with LD (Margalit & Zak, 1984). Symptoms of social anxiety in children with NLD may be associated with their characteristic particular impairments in recognizing nonverbal emotional cues, such as facial expressions and gestures (Petti et al., 2002). Their social anxiety might therefore be reasonably attributed to low social skills (Woods et al., 2000; Worling et al., 1999). On the other hand, it is common for children with RD to expect to perform badly, and to worry about having to read aloud in class, and this may trigger social anxiety symptoms. Such worries may be prompted by negative feedback from teachers, parents and classmates. Our findings also suggest that different types of LD coincide with different pictures of anxiety. In particular, our children with NLD reported experiencing higher levels of

both separation and school anxiety than children with TD (whereas the children with RD did not differ from the other two groups). It may be that NLD children suffered from more school anxiety than TD because their disorder is less well known than RD and may consequently be handled inappropriately at school (e.g., cases of NLD may go undetected and teachers may be unable to recognize NLD promptly). An inappropriate approach to these children may make them feel inadequate and anxious about their performance at school. A generally poor understanding of the symptoms typical of children with NLD could also be responsible for dysfunctional parental styles, which would further contribute to NLD children's anxiety, particularly as regards their academic achievements. In fact, a previous study by Antshel and Joseph (2006) on mothers of 8- to 11-year-old children with NLD, RD, and TD found that the mothers of the NLD group reported higher levels of dysfunctional interactions with their child than in the case of the other two groups.

Dysfunctional parental styles might likewise be associated with these children's separation anxiety. Previous research (Al-Yagon, 2003) revealed that the additional stress associated with raising a child with LD can affect children in several ways, including the children's insecure attachment to their parents. Several authors have highlighted a positive association between insecure attachment style and separation anxiety in children (Dallaire & Weinraub, 2005; Lynch & Cicchetti, 2002). Unfortunately, no information about parental styles was available for the present sample, so further research is needed to analyze the relationships among the parents' perceived stress, their parental style, and their children's separation anxiety in more depth. Another possible explanation for high levels of separation anxiety in NLD may relate to the well-known asociality and withdrawal characteristic of children and adolescents with NLD (Rourke, 1995). Their inclination to keep to themselves and become cloistered might imply a shortage of social networks other than their parents, which would give rise to a more severe separation anxiety than in TD children.

As concerns depression, children with RD had more severe symptoms than NLD or TD children. This result is consistent with a previous report from Maughan et al. (2003), who found that children with RD feature higher levels of depressed mood than their peers. It is worth noting here that, judging from the literature, children with NLD also reveal internalized forms of psychopathology, such as depression, but such observations (Casey et al., 1991; Forrest, 2004; Little, 1993) were usually based on children who were older than the 8- to 11-year-olds tested for the present study. As reported in previous research, children with NLD are also characterized by specific deficits in the use of emotional content, in making social inferences (Worling et al., 1999), and in processing social cues (Woods et al., 2000); symptoms of depression in children with NLD may consequently go underreported because of their impaired understanding of emotions. Future research should compare younger and older children with both NLD and RD to further analyze how any internalized symptoms of psychopathology develop.

Limitations and Implications for Research and Practice

Some limitations of the present research should be mentioned. The first major limitation is the small sample sizes of participants, which prevent us from generalizing conclusions on the strength of our findings-though the difficulty of recruiting NLD children has to be taken into account. In fact, as previously mentioned, NLD is not included in the actual classification systems of mental disorders, therefore it has not been easy to find children with such diagnosis in specialized clinics. Second, as mentioned previously, no information was collected on parental styles, nor have we reported on our sample's externalizing disorders. Smart, Sanson, and Prior (1996) suggested that symptoms of anxiety in RD children are mediated by any comorbid behavioral problems, and this has to be considered when interpreting the results of comparisons between NLD and RD cases on internalizing symptom measures. A last shortcoming lies in that we relied solely on self-report measures, without considering input from teachers or parents.

The present study offers a small contribution with a view to shedding light on the psychological and emotional correlates of NLD, which is a still scarcely studied issue. Future investigations should focus not only on assessing psychological distress in children with NLD, for example using interviews to enable them to express their voice, but also on whether or not all NLD children have impairments in the same areas (Forrest, 2004; Grodzinsky, Forbes, & Bernstein, 2010). Moreover, preventive approaches should be devoted to sensitizing teachers and parents to the children's emotional distress. Another topic crucial to NLD concerns the social skills, given the high levels of social anxiety frequently observed in these children. Clinical intervention targeting this population should aim both to increase these children's social skills and to help them manage their social interactions. This appears to be crucial to improving their chances of not becoming sad and withdrawn in response to negative interactions with other children (Little, 1993; Rourke & Tsatsanis, 2000).

The emotional needs of LD children are often underestimated and frequently ignored by teachers (Bender & Wall, 1994; Rock, Fessler, & Church, 1997), who are often trained to recognize LD and deal with LD children, but given little or no information about how to detect and manage these children's affective correlates and psychopathological comorbidities. Failing to target their anxiety symptoms in the earliest possible stages may exacerbate their anxiety and foster the development of other psychological disorders, such as depression (Cicchetti & Toth, 1998). In the light of the evidence-based cognitive-behavioral treatments available for anxiety disorders in childhood (American Academy of Child and Adolescent Psychiatry, 2007), it would be advisable to combine individual and group interventions at school with training for parents (Barrett, Dadds, & Rapee, 1996; Muris, Mayer, Bartelds, Tierney, & Bogie, 2001).

In conclusion, our findings show that children with NLD and RD have important differences in their psychopathological symptoms. Both groups reportedly experienced more severe generalized and social anxiety than TD children. NLD children experienced more school and separation anxiety than their TD counterparts, whereas children with RD had worse depressive symptoms than either NLD or TD children.

Declaration of Conflicting Interests

The author(s) declared no potential conflicts of interest with respect to the research, authorship, and/or publication of this article.

Funding

The author(s) disclosed receipt of the following financial support for the research, authorship, and/or publication of this article: The present study was supported by the University of Padova (CPDA107090/10) to M. G.

Note

1. It is worth noting that due to the high discrepancy between verbal intelligence quotient (VIQ) and performance intelligence quotient (PIQ; or between the two factorial indices of verbal comprehension index [VCI] and perceptual organization index [POI]) the total IQ of children with nonverbal learning disabilities is often lower of the total IQ usually observed in other children with learning disabilities. For this reason, as the exclusion criterion we were forced to use a total IQ less than 80.

References

- Al-Yagon, M. (2003). Children at risk for learning disorders: Multiple perspectives. *Journal of Learning Disabilities*, 36, 318–335.
- American Academy of Child and Adolescent Psychiatry. (2007). Practice parameters for the assessment and treatment of children with anxiety disorders. *Journal of the American Academy* of Child and Adolescent Psychiatry, 46, 267–283.
- American Psychiatric Association. (2013). Diagnostic and statistical manual of mental disorders (5th ed.). Washington, DC: Author.
- Antshel, K. M., & Joseph, G. R. (2006). Maternal stress in nonverbal learning disorder: A comparison with reading disorder. *Journal of Learning Disabilities*, 39, 194–205.

- Bandura, A., Pastorelli, C., Barbaranelli, C., & Caparra, G. V. (1999). Self-efficacy pathways to childhood depression. *Journal of Personality and Social Psychology*, 76, 258–269.
- Barrett, P. M., Dadds, M. R., & Rapee, R. M. (1996). Family treatment of childhood anxiety: A controlled trial. *Journal of Consulting and Clinical Psychology*, 64, 333–342.
- Beery, K. E., & Buktenica, N. A. (2004). VMI Developmental test of Visual Motor Integration (5th ed.). Eagan: Pearson Assessments.
- Bender, W. N., & Wall, M. E. (1994). Social-emotional development of students with learning disabilities. *Learning Disability Quarterly*, 17, 323–341.
- Boetsch, E. A., Green, P. A., & Pennington, B. F. (1996). Psychosocial correlates of dyslexia across the lifespan. Development and Psychopathology, 8, 539-562.
- Bosquet, M., & Egeland, B. (2006). The development and maintenance of anxiety symptoms from infancy through adolescence in a longitudinal sample. *Development and Psychopathology*, 18, 517–550.
- Burkhardt, S. (2005). Non-verbal learning disabilities. In S. Burkhardt, F. Obiakor, & A. F. Rotatori (Eds.), *Current perspectives on learning disabilities* (Advances in Special Education vol. 16, pp. 21–33). Bingley, UK: Emerald.
- Camuffo, M., Cerutti, R., Lucarelli, L., & Mayer, R. (1988). C.D.I. Children Depression Inventory. Questionario di autovalutazione. Manuale. Florence, Italy: Organizzazioni Speciali.
- Carroll, J. M., Maughan, B., Goodman, R., & Meltzer, H. (2005). Literacy difficulties and psychiatric disorders: Evidence for comorbidity. *Journal of Child Psychology and Psychiatry*, 46, 524–532.
- Casey, J. E., Rourke, B. P., & Picard, E. M. (1991). Syndrome of nonverbal learning disabilities: Age differences in neuropsychological, academic, and socioemotional functioning. *Development and Psychopathology*, 3, 329–345.
- Cianchetti, C., & Fancello, G. (2001). Scale Psichiatriche di Auto-somministrazione per Fanciulli e Adolescenti (SAFA) [Self-Administered Psychiatric Scales for Children and Adolescents]. Florence, Italy: Organizzazioni Speciali.
- Cicchetti, D., & Toth, S. (1998). The development of depression in children and adolescents. *American Psychologist*, 53, 221–241.
- Cohen, J. (1988). Statistical power analysis for the behavioral sciences. Hillsdale, NJ: Lawrence Erlbaum.
- Cornoldi, C., & Colpo, G. (1998). Prove di lettura MT per la scuola elementare [Tests of Reading for Primary School]. Florence, Italy: Organizzazioni Speciali.
- Cornoldi, C., Lucangeli, D., & Bellina, M. (2002). AC-MT Test: Test per la valutazione delle difficoltà di calcolo [The AC-MT Arithmetic Achievement Test]. Trento, Italy: Erickson.
- Cornoldi, C., Rigoni, F., Tressoldi, P. E., & Vio, C. (1999). Imagery deficits in nonverbal learning disabilities. *Journal of Learning Disabilities*, 32, 48–57.
- Dahle, A. E., Knivsberg, A., & Andreassen, A. B. (2011). Coexisting problem behaviour in severe dyslexia. *Journal of Research in Special Educational Needs*, 11, 162–170.
- Dallaire, D. H., & Weinraub, M. (2005). Predicting children's separation anxiety at age 6: The contributions of infant-mother attachment security, maternal sensitivity, and maternal separation anxiety. Attachment & Human Development, 7, 393-408.

- Feng, Z. Z., Zhang, D. J., & Wang, F. (2005). Analysis of influencing factors in depressive symptoms in middle school students. *Chinese Journal of Clinical Psychology*, 13, 446–448.
- Fine, J., Semrud-Clikeman, M., Bledsoe, J., & Musielak, K. (2013). A critical review of the NLD literature as a developmental disorder. *Child Neuropsychology*, 19, 190–223.
- Fisher, B. L., Allen, R., & Kose, G. (1996). The relationship between anxiety and problem-solving skills in children with and without learning disabilities. *Journal of Learning Disabilities*, 29, 439–446.
- Forrest, B. J. (2004). The utility of math difficulties, internalized psychopathology, and visual-spatial deficits to identify children with the nonverbal learning disability syndrome: Evidence for a visual-spatial disabilities. *Child Neuropsychology*, 10, 129–146.
- Forrest, B. (2007). Diagnosing and treating right hemisphere disorders. In S. J. Hunter & J. Donders (Eds.), *Pediatric neuropsychological intervention* (pp. 175–192). Cambridge, UK: Cambridge University Press.
- Geisthardt, C., & Munsch, J. (1996). Coping with school stress: A comparison of adolescents with and without learning disabilities. *Journal of Learning Disabilities*, 29, 287–296.
- Goldston, D. B., Walsh, A., Arnold, E. M., Reboussin, B. A., Daniel, S. S., Erkanlil, A., . . . Wood, F. B. (2007). Reading problems, psychiatric disorders, and functional impairment from mid- to late adolescence. *Journal of the American Academy of Child and Adolescent Psychiatry*, 46, 25–32.
- Grodzinsky, G. M., Forbes, P. W., & Bernstein, J. H. (2010). A practice-based approach to group identification in nonverbal learning disorders. *Child Neuropsychology*, 16, 433–460.
- Gross-Tsur, V., Shalev, R. S., Manor, O., & Amil, N. (1995). Developmental right hemisphere syndrome: Clinical spectrum of the nonverbal learning disability. *Journal of Learning Disabilities*, 28, 80–86.
- Grover, R. L., Ginsburg, G. S., & Ialongo, N. (2005). Childhood predictors of anxiety symptoms: A longitudinal study. *Child Psychiatry and Human Development*, 36, 133–153.
- Heath, N. L., & Wiener, J. (1996). Depression and nonacademic self-perceptions in children with and without learning disabilities. *Learning Disabilities Quarterly*, 19, 34–44.
- Heiervang, E., Stevenson, J., Lund, A., & Hugdahl, K. (2001). Behavior problems in children with dyslexia. Nordic Journal of Psychiatry, 55, 251–256.
- Helland, T., & Asbjørnsen, A. E. (2004). Digit span in dyslexia: Variations according to language comprehension abilities and mathematics skills. *Journal of Clinical & Experimental Neuropsychology*, 26, 31–42.
- Howard, K. A., & Tryon, G. S. (2002). Depressive symptoms in and type of classroom placement for adolescent with LD. *Journal of Learning Disabilities*, 35, 185–191.
- Kessler, R. C., Berglund, P., Demler, O., Jin, R., Merikangas, K. R., & Walters, M. E. (2005). Lifetime prevalence and ageof-onset distributions of *DSM-IV* disorders in the National Comorbidity Survey replication. *Archives of General Psychiatry*, 62, 593–602.
- Kessler, R. C., Foster, C. L., Saunders, W. B., & Stang, P. E. (1995). Social consequences of psychiatric disorders, I: Educational attainment. *American Journal of Psychiatry*, 152, 1026–1032.

- Kirkwood, M. W., Weiler, M. D., Bernstein, J. H., Forbes, P. W., & Waber, D. P. (2001). Sources of poor performance on the Rey-Osterrieth Complex Figure Test among children with learning difficulties: A dynamic assessment approach. *Clinical Neuropsychology*, 15, 345–356.
- Kovacs, M. (1982). The Children's Depression Inventory manual. New York, NY: Multi-Health Systems.
- Lipowska, M., Czaplewska, E., & Wysocka, A. (2011). Visuospatial deficits of dyslexic children. *Medical Science Monitor*, 17, 16–21.
- Little, S. S. (1993). Nonverbal learning disabilities and socioemotional functioning: A review of recent literature. *Journal of Learning Disabilities*, 26, 653-665.
- Lynch, M., & Cicchetti, D. (2002). Links between community violence and the family system: Evidence from children's feelings of relatedness and perceptions of parent behavior. *Family Process*, 41, 519–532.
- Maag, J. W., & Reid, R. (2006). Depression among students with learning disabilities: Assessing the risk. *Journal of Learning Disabilities*, 39, 3–11.
- Mammarella, I. C., & Cornoldi, C. (2005). Difficulties in the control of irrelevant visuospatial information in children with visuospatial learning disabilities. Acta Psychologica, 118, 211–228.
- Mammarella, I. C., & Cornoldi, C. (in press). An analysis of the criteria used to diagnose children with nonverbal learning disability. *Child Neuropsychology*.
- Mammarella, I. C., Lucangeli, D., & Cornoldi, C. (2010). Spatial working memory and arithmetic deficits in children with nonverbal learning difficulties (NLD). *Journal of Learning Disabilities*, 43, 455–468. doi:10.1177/0022219409355482
- Mammarella, I. C., Meneghetti, C., Pazzaglia, F., Gitti, F., Gomez, C., & Cornoldi, C. (2009). Representation of survey and route spatial descriptions in children with nonverbal (visuospatial) learning disabilities. *Brain and Cognition*, 71, 173–179.
- Margalit, M., & Shulman, S. (1986). Autonomy perceptions and anxiety expressions of learning disabled adolescents. *Journal* of *Learning Disabilities*, 19, 291–293.
- Margalit, M., & Zak, I. (1984). Anxiety and self-concept of learning disabled children. *Journal of Learning Disabilities*, 17, 537–539.
- Maughan, B., & Carroll, J. (2006). Literacy and mental disorders. Current Opinion in Psychiatry, 19, 350-354.
- Maughan, B., Rowe, R., Loeber, R., & Stouthamer-Loeber, M. (2003). Reading problems and depressed mood. *Journal of Abnormal Child Psychology*, 31, 219–229.
- Miller, C., Hynd, G. G., & Miller, S. (2005). Children with dyslexia: Not necessarily at risk for elevated internalizing symptoms. *Reading and Writing*, 18, 425–436.
- Muris, P., Mayer, B., Bartelds, E., Tierney, S., & Bogie, N. (2001). The revised version of the Screen for Child Anxiety Related Emotional Disorders (SCARED-R): Treatment sensitivity in an early intervention trial for childhood anxiety disorders. British Journal of Clinical Psychology, 40, 323–336.
- Myklebust, H. R. (1975). *Progress in learning disabilities* (Vol. 3). New York, NY: Grune & Stratton.
- Nacinovich, R., Gadda, S., Maserati, E., Bomba, M., & Neri, F. (2012). Preadolescent anxiety: An epidemiological study

concerning an Italian sample of 3479 nine-year-old pupils. Child Psychiatry and Human Development, 43, 27-34.

- Nelson, J. M., & Harwood, H. (2011). Learning disabilities and anxiety: A meta-analysis. *Journal of Learning Disabilities*, 44, 3-17.
- Newcomer, P. L., Barenbaum, E., & Pearson, N. (1995). Depression and anxiety in children and adolescents with learning disabilities, conduct disorders, and no disabilities. *Journal of Emotional and Behavioral Disorders*, 3, 27–39.
- Ozonoff, S., & Rogers, S. J. (2003). Autism spectrum disorders: A research review for practitioners. In S. Ozonoff, S. J. Rogers, & R. L. Hendren (Eds.), *Review of psychiatry* (pp. 3–33). Washington, DC: American Psychiatric Association.
- Pelletier, P. M., Ahmad, S. A., & Rourke, B. P. (2001). Classification rules for basic phonological processing disabilities and nonverbal learning disabilities: Formulation and external validity. *Child Neuropsychology*, 7, 84–98.
- Petti, V. L., Voelker, S. L., Shore, D. L., & Hayman-Abello, S. E. (2002). Perception of nonverbal emotion cues by children with nonverbal learning disabilities. *Journal of Developmental and Physical Disabilities*, 15, 23–36.
- Prior, M., Smart, D., & Oberklaid, F. (1999). Relationships between learning difficulties and psychological problems in preadolescent children from a longitudinal sample. *Journal of* the American Academy of Child and Adolescent Psychiatry, 38, 429–436.
- Rock, E. E., Fessler, M. A., & Church, R. P. (1997). The concomitance of learning disabilities and emotional/behavioral disorders: A conceptual model. *Journal of Learning Disabilities*, 30, 245–263.
- Rourke, B. P. (1993). Arithmetic disabilities, specific and otherwise: A neuropsychological perspective. *Journal of Learning Disabilities*, 26, 214–226.
- Rourke, B. P. (1995). Syndrome of nonverbal learning disabilities: Neurodevelopmental manifestations. New York, NY: Guilford.
- Rourke, B. P., & Tsatsanis, K. D. (2000). Nonverbal learning disabilities and Asperger syndrome. In A. Klin, F. R. Volkmar, & S. S. Sparrow (Eds.), *Asperger syndrome* (pp. 231–254). New York, NY: Guilford.
- Semrud-Clikeman, M., Walkowiak, J., Wilkinson, A., & Portman Minne, E. (2010). Direct and indirect measures of social perception, behavior, and emotional functioning in children with Asperger's disorder, nonverbal learning disability, or ADHD. *Journal of Abnormal Child Psychology*, 38, 509–519.
- Sideridis, G. (2007). Why are students with LD depressed? A goal orientation model of depression vulnerability. *Journal of Learning Disabilities*, 40, 526–539.
- Smart, D., Sanson, A., & Prior, M. (1996). Connections between reading disability and behaviour problems: Testing temporal and causal hypotheses. *Journal of Abnormal Child Psychology*, 24, 363–383.
- Sourander, A., Multimäki, P., Nikolakaros, G., Haavisto, A., Ristkari, T., Helenius, H., . . . Almqvist, F. (2005). Childhood predictors of psychiatric disorders among boys: A prospective community-based follow-up study from age 8 years to early adulthood. Journal of the American Academy of Child and Adolescent Psychiatry, 44, 756–767.

- Spreen, O. (2011). Nonverbal learning disabilities: A critical review. Child Neuropsychology, 17, 418-443.
- Stringer, R. W., & Heath, N. (2006). Possible relationships between depressive symptoms and reading. *Canadian Journal* of School Psychology, 21, 93–105.
- Tur-Kaspa, H., Weisel, A., & Segev, L. (1998). Attributions for feelings of loneliness of students with learning disabilities. *Learning Disabilities Research and Practice*, 13, 89–94.
- Van Ameringen, M., Mancini, C., & Farvolden, P. (2003). The impact of anxiety disorders on educational achievement. *Journal of Anxiety Disorders*, 17, 561–571.
- Venneri, A., Cornoldi, C., & Garuti, M. (2003). Arithmetic difficulties in children with visuospatial learning disability (VLD). Child Neuropsychology, 9, 175–183.
- Wechsler, D. (1991). Wechsler Intelligence Scale for Children (3rd ed.). San Antonio, TX: Psychological Corporation.
- Wenz-Gross, M., & Siperstein, G. (1998). Students with learning problems at risk in middle school: Stress, social support and adjustment. *Exceptional Children*, 65, 91–100.
- Wiener, J., & Sunohara, G. (1998). Parents' perceptions of the quality of friendship of their children with learning

disabilities. Learning Disabilities Research and Practice, 13, 242–257.

- Willcutt, S., & Pennington, B. F. (2000). Psychiatric comorbidity in children and adolescents with reading disabilities. *Journal* of Child and Adolescent Psychiatry, 41, 1039–1046.
- Wilson, A. M., Deri Armstrong, C., Furrie, A., & Walcot, E. (2009). The mental health of Canadians with self-reported learning disabilities. *Journal of Learning Disabilities*, 42, 24–40.
- Woods, S. P., Weinborn, M., Ball, J. D., Tiller-Nevin, S., & Pickett, T. C. (2000). Periventricular leukomalacia (PVL): An identical twin case study illustration of white matter dysfunction and nonverbal learning disability (NLD). *Child Neuropsychology*, 6, 274–285.
- World Health Organization. (1992). ICD-10, International Statistical Classification of Diseases and Related Health Problems, 10th revision. Geneva, Switzerland: Author.
- Worling, D. E., Humphries, T., & Tannock, R. (1999). Spatial and emotional aspects of language inferencing in nonverbal learning disabilities. *Brain and Language*, 70, 220–239.

Good morning. My name is Janet Larsen from Menomonee Falls. I'd like to thank you chairperson Thiesfeldt and Kitchens and all distinguished members of the Assembly Education Committee

I'm here today to voice my emphatic support for Assembly Bill 110, the creation of a dyslexia guidebook. If 12 years ago such a resource was available, I am 100% positive my life would be very different.

To illustrate how impactful a guidebook could have been, I shall briefly convey my experience with IEP's. We had 3 IEPs in 8 months.

If we add the Service Agreement generated through private school/public school Child Find process, we had four IEPs in 13 months.

Sadly, none of them were effective; twice I believe laws were broken. My child only fell further behind.

While so many of my peers struggle to secure just one IEP meeting, after their child has failed significantly enough, I had the luxury of four.

But here is the sad truth - ignorance of dyslexia, ignorance of the science of reading, and ignorance of the most effective methods to teach all of our children to read – renders dyslexia IEPs worthless.

I know this because I have lived it. You may think it only my opinion; the one fact I know is that ignorance was a major factor in the failure at least 4 IEPs.

When people use and hear the word 'ignorance' there usually is a negative connotation. For me that is not the case. When I was a teacher in a previous life, in a corporate setting, I shared with my students the four stages of gaining skill proficiently.

There are four steps in this learning ladder:

			<u>Un</u> conscious Competence
		Conscious	
		Competence	
	Conscious		
	In competence		
<u>Un</u> conscious			
Incompetence			

<u>Un</u>conscious <u>In</u>competence

I am ignorant in so many things and certainly was ignorant about dyslexia. You see I didn't know what I didn't know - unconscious incompetent.

I was asleep. I knew nothing of dyslexia – I didn't know any dyslexics, even though I married one. I didn't know anything about the science of reading, 44 phonemes, morphology.

Conscious <u>In</u>competence

And then something happened - a dramatic **paradigm shift** rocked my world. The official diagnosis and a construct to help me begin to learn about dyslexia. I moved to Step Two on my ladder of learning – Conscious <u>In</u>competence

I knew nothing and needed to learn very very quickly for the sake of my child's future. Dozens of books later, counsel with private sector experts, trials-failures- triumphs.

Conscious Competence

Thankfully I crawled up to the next step – Conscious Competence. I now know just enough to find the right resources and the right people to assist me in homeschooling my child.

<u>**Un</u>conscious Competence**</u>

Never will I achieve Unconscious Competence in the area of dyslexia.

However, I believe there are many in this room who have. They know dyslexia is real and distinct, they know its definition, they can see the early signs, they utilize systematic methods that teach kids to read.

They are our saviors. They change lives. They identify – help – act quickly. They bring our children out of a deep downward spiral of despair.

They typically are NOT part of our public education system. In twelve years, I have not encountered a single educator who is **Un**consciously Competent in the area of dyslexia.

Please change that. Passage of AB110 and AB50 is imperative

Thank you for your time and dedication to our dyslexic children.

Good Morning Mr. Chairman and Members of the Education Committee,

My name is Cate Sabol, I live in Racine, WI and am here today in support of Bill AB 110, the creation of a Dyslexia handbook.

I am Dyslexic.

More importantly, my daughter Lennon is Dyslexic. Lennon is nine years old and in the third grade; she is a bright, funny, creative and compassionate child who is currently limited in her abilities to succeed academically and emotionally because of her Dyslexia. While she is in third grade she reads at a second grade level and as we are reminded; third grade is the year children: "stop learning to read" and "start reading to learn".

Studies show early intervention is imperative; yet we have been looking for help since Lennon was three. Consider how much farther along she would be if proper diagnostic and teaching tools had been in place. Lennon would not have spent the last six years filled with self-doubt, anxiety and low self-confidence had appropriate resources been available. We would not have spent the last four years having to systematically work through state regulated assessments while also spending money out of pocket for private testing and tutoring attempting to help our sweet girl. Only THIS YEAR did Lennon finally qualify for an IEP under the category, "unspecified learning disability". She is now receiving remediation in the classroom, but since Dyslexia is not recognized and educators are not receiving the proper tools and training, the remediation is not focused in ways proven to best help Dyslexics.

In preparation for today I asked Lennon what she would like me to convey to help you understand what living with Dyslexia is like. She described often feeling left out because she doesn't understand what is being said or explained. She struggles with feelings of anxiety, worrying about being called on in class or being asked to read aloud. Frustration and self-doubt stems from knowing she can't read, write, spell or solve math problems age appropriately like her peers. She avoids social settings for fear of being asked to do something she is doesn't know how to do, (imagine going to dinner with a friend's family and not being able to read the menu and place an order; all in front of your friend and their family). While most children are elated to hear there will be a substitute teacher, Lennon cringes for fear the substitute will not understand her challenges.

This is not only an academic issue, it is an emotional one. Children with Dyslexia deserve the correct tools and properly trained educators so they have the opportunity to thrive equally. It is unfair those with Dyslexia must work twice as hard as their neuro typical peers to achieve similar results and the additional stress and anxiety this causes our children is unacceptable.

As Ignacio Estrada said, "If children cannot learn the way we teach, maybe it is time we start teaching the way they learn." And as her namesake, (and ironically fellow Dyslexic), John Lennon, Imagined; "You may say I am a dreamer, but I'm not the only one. I hope someday you'll join us and the world will live as one."

In conclusion, I would like to share another comment from Lennon which I feel exemplifies the tenacity and optimism of Dyslexic children.

"I think having Dyslexia is frustrating, she said, but I also think of it as my super power. Not everyone has to come up with as many different ways to do things as I do."

Thank you for your time and the opportunity to share Lennon's story with you and please support Bill AB 110.

Kindly, Cate Sabol

2139 Ramada Drive, Mount Pleasant, WI 53406 – 262.902.2765 – c8sabol@gmail.com



o

Opinion Writing Name: Lennon Topic: Do you prefer summer or fall? Iprefer Summer because... Reason: You can go to the (broka) Reason 2: Thard is no School. Reason 3: My (IImiya) 90 on Vekashina). Conclusion Statement: I (Thick Scimmer the protist S

Opinion Writing Name: Topic: Do you prefer summer or fall? I prefer Summer because... can go to the beach and go in the marther Summer is also grat because there no school. Summer is also graft because my family go on vekashing I thick Summer is the besta

Name: LEUNON

-	Word of the Week: construct
Thursday	Use it! Write a paragraph (or several sentences) that use this week's word. Be sure that someone could figure out what the word means just by using the clues in your sentences. MY dad CONSTRUCT Stofa. I CONSTRUCT A 1090 hoseu in to day S. I trgat to construct MY homewrka.
	Assess it! Rate your understanding of the word. I don't know that word. Heard it, but don't really understand it. I could describe what it means. I could describe what it means.
	Answer the questions below. I. Complete the sentence.
Ĭ	If I could construct anything, I would make Q QUMIA LIS SHITH
Frido	 Which of these is most likely to be used to construct a bridge? a. cardboard b. steel c. paper d. plastic
	3. If you could construct your dream home, what would be special about it? A STOKAL HOOM WITH A DOWN OF PUPPY and dogs

Name:

		1		
1)	a	T	$^{-}$	•
$\boldsymbol{\nu}$	J		\sim	

Daily Vocabulary Practice (Week 24)

	Word of the Week: cons	truct	Model Sentence Highlight the word and circle		
nday	Rate it: How well do you know this wo Never heard it. Heard it, but don't know the meaning. Definition:	ord?	When they built the new neighborhood, they had to		
Wo	Construct means to build or n	ans to build or make.			
	Model Sentence:		Visualize It!		
	During science, we tried to construct airplane that could fly at least 10 feet	Draw a picture or symbol to show what this word means.			
Tuesday	Define it! Write a definition for this term in your own words below. TDDUILDONM				
>	Synonyms		Antonyms		
Wednesda	Mak Duild Put tgetap	dstron brak taryd	0 n O		



Dxlyseia is cctarrizeeahd by dliciftfuy with liranneg to read fulnetly and with acrtacue cosomeernpihn dtipese nraoml ieinntglekce. This iueIncds dflificuty with pnoaclihgool awsnaeres, poonlgaicohl dncoeidg, pernosesig speed, oirtarphoghc ciodng. auidroty sorht-trem meormy, Iganuage slliks/vaberl csheroominepn, and/or rpaid ninmag.

Having trouble reading that?

Dyslexia is an unexpected difficulty with reading in an individual who **has the intelligence** to be a much better reader. While people with dyslexia are slow readers, they often, paradoxically, are very **fast and creative thinkers with strong reasoning abilities**.

As for the text above, here's some help...

Dyslexia is characterized by difficulty with learning to read fluently and with accurate comprehension despite normal intelligence. This includes difficulty with phonological awareness, phonological decoding, processing speed, orthographic coding, auditory short-term memory, language skills/verbal comprehension, and/or rapid naming.

Shouldn't our children get the help they need too? Pass 2019 Wisconsin Assembly Bills 50 & 110.



Search Log In Sign Up Search Foundation Started by Richard Branson Talso Dysfexic



DYSLEXIA
SHOWCASE
Made by dyslexia

IN PARTNERSHIP WITH

madebydyslexia • Follow

madebydyslexia **(**] Big News! We're launching our Dyslexia Showcase events in partnership w/ @microsoftedu in Atlanta on April 25. We'll be showcasing our #DyslexiaAwareness training and explaining why it's so important #teachers, #educators, #parents understand the #ValueOfDyslexia and how to support it. Read our blog for all the details. #mondaymotivation

vidisha67 👍

228 likes

8 HOURS AGO

Log in to like or comment.

ABOUT US SUPPORT PRESS API JOBS PRIVACY TERMS DIRECTORY PROFILES HASHTAGS LANGUAGE © 2019 INSTAGRAM

Learning Disabilities and Adolescent Suicide

Hazel E. A. McBride and Linda S. Siegel

Abstract

To investigate the hypothesis that learning disabilities (LD) play a part in adolescent suicide, all available suicide notes (n = 27) from 267 consecutive adolescent suicides were analyzed for spelling and handwriting errors. The suicide notes were dictated to adolescents with LD and adolescent non-LD controls. The results showed that 89% of the 27 adolescents who committed suicide had significant deficits in spelling and handwriting that were similar to those of the adolescents with LD, and they were significantly more impaired than the non-LD adolescents and older adults (65 and older) who had committed suicide in the same time period and in the same geographical area.

dolescent suicide is not a new problem. The first symposium on adolescent suicide was held in Vienna, Austria, in 1910 under the chairmanship of Sigmund Freud (Berman, 1986; Friedman, 1967). The questions asked then are the same questions we are still asking today.

In Europe, rates of adolescent suicide peaked in 1910 and then declined steadily until the 1960s, when they again began to increase. By the mid 1970s the European adolescent suicide rate had matched the rate in 1910, and it has continued to climb. Over the past two decades, many countries in Europe have shown a considerable increase in the frequency of suicide in 15- to 29-year-olds (Diekstra, 1992).

In North America, adolescent suicide has also become a major public health problem. Currently, suicide is the third leading cause of adolescent death in both Canada and the United States (Berman & Jobes, 1991). Suicide rates in the United States increased 142% between 1960 and 1981 for both boys and girls in the 15-to-19-yearold age group. This increase occurred despite only a small increase in the overall suicide rates for all ages (13%) during the same period (Roy, 1986). In Canada, the Suicide Information and Education Center in Calgary documented a 60% increase in adolescent suicides between 1970 and 1985. Among industrialized nations, Canada now ranks as the third highest (after Australia and Norway) in suicide rates for the 15-to-24-year-old age group an increase of 50% in one generation (UNICEF, 1993).

Several theories have been generated to explain the rise in adolescent suicide rates. It has been hypothesized that these rates are related to cultural differences or may be a cohort effect as a result of the postwar "baby boom" (Hafner & Schmidtke, 1987; Holinger, Offer, & Zola, 1988). Diekstra (1988) found that changes in the suicide rate in Europe for the age group 15 to 29 were related to changes in social conditions. In the United States, Lee (1978) found that an increase in certain risk factors, such as family divorce rates, paralleled the increase in adolescent suicide. (However, other studies have found the divorce rate in families of adolescents who commit suicide to be similar to those found among psychiatrically disturbed adolescents in general [Roy, 1986].) In addition, there are indications that psychiatric illness, deaths, school problems, life events, and losses are associated with adolescent suicide (Brent, Perper, & Goldstein, 1988; Shaffer, 1974, 1988).

Another theory (Boyd & Moscicki, 1986) posits that the increase is linked to the availability of guns and the corresponding increase in the use of firearms as a suicide method. There are still other studies that link increases in drug and alcohol abuse among adolescents to the increase in suicide (Hawton, 1986).

At the present time, despite numerous efforts to explain the causes of adolescent suicide, there is no one generally accepted theory. In addition, although there is considerable information on "risk factors" associated with adolescent suicide, these same factors apply to other adolescent populations that do not commit suicide, and they have not been found to discriminate adolescents at high risk of suicide from other adolescents. However, there are a number of risk factors, such as life events, trauma, and learning disabilities (LD), that have not as yet been extensively investigated in the adolescent suicide population. A review of the literature showed that in many studies of adolescent suicide, suicidologists have mistakenly assumed that an average or aboveaverage IQ score precludes the possibility that the victim had a learning disability (Shaffer, 1974). This assumption has resulted in learning disabilities' being underinvestigated as a risk factor in adolescent suicide. The extent of the problem, the lack of consensus on causal factors, the poor predictability of identified risk factors, and the limited investigations of some risk factors indicate the necessity for further research in this area.

Although a number of etiological factors have been suggested, the role of learning disabilities and their associated cognitive and memory deficits have rarely been directly studied as possible contributing factors to suicide in adolescents (Silver, 1993). The majority of studies in this area have investigated the relationship of depression to learning disabilities (Curran, 1987; Frederick, 1977; Lee, 1978; Livingston, 1985; Reynolds, 1984). In one of the few studies to directly assess suicidal populations for the presence of learning disabilities, Kenny and Rohn (1979) found that a group of 18 adolescents who had attempted suicide showed a pattern of visualmotor dysfunction similar to that seen in children who received diagnoses of neurologic dysfunction and learning disabilities. The adolescents who attempted suicide were found to be significantly more impaired than a control group of nonsuicidal adolescents with medical problems. In another study, Peck (1985) found that over 50% of all suicides under age 15 in Los Angeles County had been previously diagnosed as having learning disabilities. The actual percentage of youngsters labeled learning disabled in most school districts in the United States is below 5%; therefore, it seems clear that youngsters with learning disabilities constitute a disproportionately large percentage of adolescent suicides compared with the general adolescent population (Peck, 1985).

Recently there has been widespread interest in the hypothesis that persons with a specific kind of learning disability, nonverbal learning disability, are at increased risk for depression and suicide (Rourke, Young, & Leenaars, 1989). This disability is characterized by such deficits as poor organizational skills, short-term memory problems, poor problem-solving skills, poor social skills, difficulty in interpersonal relationships, lack of insight, and a failure to learn from experience (Rourke, 1987, 1988; Rourke et al., 1989; Siegel & Heaven, 1986). This learning disability is also known as *arithmetic/ writing disability*, as the deficits cause significant difficulty in the mechanical aspects of writing and in computational arithmetic (Siegel & Heaven, 1986).

Many children and adults with learning disabilities have significant deficits in written expressive language, including difficulty in forming letters, grammar and syntax, punctuation, and spelling (Blalock, 1981; Bruck & Waters, 1988; Cordoni, 1979; Gregg, 1983; Vogel, 1987; Vogel & Moran, 1982). It has been hypothesized that these deficits persist into adulthood because written expressive language is the most complex skill in the languagelearning process and, as such, is dependent on the successful accomplishment of the preceding steps in the hierarchy (Vogel & Konrad, 1988). Therefore, it would seem reasonable to assume that an analysis of handwriting and spelling errors contained in suicide notes would give some indication of the presence of learning problems in the writers of the notes. We investigated this question by analyzing suicide notes for errors in spelling and written language.

Although there have been a number of studies of suicide notes, they have largely focused on the semantic content of the notes and ignored errors in spelling and handwriting, which may be indicators of learning disabilities (Leenaars, 1988).

Method

Participants

Adolescents Who Committed Suicide. All sudden deaths in the province of Ontario must be reported to

the Office of the Chief Coroner of Ontario, and all information and reports relating to such deaths must be forwarded to that office. For this study, the chief coroner's files of all adolescent suicides (ages 11 through 21) recorded in the province of Ontario in the years 1987, 1988, and 1989 were examined. A comparison was made between those adolescents who left suicide notes (n = 36) and the total sample (n = 267) using chi-square analysis. No significant differences were found between those who wrote suicide notes and the total sample in age, gender, locale, threats, previous attempts, addictions, blood alcohol levels, psychiatric disorders, or precipitating or predisposing factors. Less than 20% of the writers of the notes were reported to have a history of school problems, and none were reported to have been previously identified as learning disabled or placed in a special education classroom; however, as we could not directly interview the respondents because of confidentiality regulations, it is possible that school problems were either under- or overreported.

All available suicide notes of the adolescents who committed suicide over the 3-year period were photocopied. There were 36 available adolescent suicide notes, 9 of which were excluded. Several notes that were heavily spotted with blood were illegible, and several notes that had been photocopied by the police were also illegible, because they had been written on materials such as paper towels and did not photocopy well. In addition, several notes that were written with unorthodox writing materials (e.g., lipstick) were not used, as they would have been too obviously different from the notes written by the controls. Notes written in foreign languages were also omitted.

Adolescents with Learning Disabilities. The LD control group comprised adolescents who were referred to a clinic for assessment of learning problems or who had previously been diagnosed and formally identified as learning disabled and were attending local schools where they received special education help. Students were considered to be reading disabled if they scored below the 25th percentile on either the Woodcock Word Attack subtest of the Woodcock Reading Mastery Tests (Woodcock, 1973) or the Wide Range Achievement Test-Revised (WRAT-R; Jastak & Wilkinson, 1984) Reading subtest. Students were identified as arithmetic/writing disabled if they scored below the 25th percentile on the WRAT-R Arithmetic subtest but above the 30th percentile on the WRAT-R Reading subtest. In addition, all of the group with learning disabilities had been officially identified as learning disabled by either an identification placement and review committee at the elementary or high school level or a special needs committee at the college level.

Adolescents Without LD. The Non-LD control group comprised adolescents attending local schools in the same geographic area as the clinic, who had no identified learning problems and showed normal achievement in school.

Mean Age. No significant differences in age were found among the three groups, F(2, 93) = .135, p < .874. Mean ages for the adolescents who committed suicide, the normally achieving adolescents, and the adolescents with learning disabilities were, respectively, 17.7 (SD = 1.50), 17.9 (SD = 1.89), and 18.0 (SD = 2.24) years.

Older Adults Who Committed Suicide. The chief coroner's records of all older adults (ages 65+) who had committed suicide in the province of Ontario in the year 1989 were examined, and all available suicide notes were photocopied. Sixteen suicide notes, 10 of which were usable, of these older adults who had committed suicide were available for comparison. Six notes were omitted because the writers had physical conditions that would affect their spelling and handwriting, such as Parkinson's Disease, dementia, or very poor eyesight due to cataracts and glaucoma, or because the notes were illegible or written in a foreign language.

Procedure

1. Data collection. Data concerning the adolescents and older adults who committed suicide were collected from a comprehensive review of the files in the Office of the Chief Coroner of Ontario. All available data were recorded on a data sheet and then entered into a computer database. Photocopies were made of all available suicide notes. Each of the chief coroner's files contains a standardized report by the regional attending coroner who was present at the scene of the suicide; the pathologist's postmortem report; a copy of the police report detailing the entire police investigation (including transcriptions of interviews); any available suicide notes; and any other miscellaneous material relevant to the suicide, such as letters from relatives to the Office of the Chief Coroner. The reports contained in the coroner's files were both detailed and thorough and supplied a considerable amount of information. All interviews were conducted by highly trained investigators, and the information can be regarded as both accurate and reliable. Coroners' files must be presented in court in cases where there is an inquest, a criminal trial, or a civil lawsuit and are prepared to fulfill stringent criteria.

2. Socioeconomic status and IQ. Socioeconomic status (SES) and IQ could not be reliably established from the available data; however, it is generally accepted that there is no consistent relationship between adolescent suicide and family SES or IQ (Berman & Jobes, 1991; Garfinkel & Golombek, 1983; Hoberman & Garfinkel, 1988; Maris, 1981; Roy, 1983). In addition, Shaffer (1974) found no significant difference in IQ between those committing suicide who left notes and those who did not leave notes.

3. Dictation of suicide notes. The original suicide notes of the adolescents

who committed suicide were dictated to adolescents withouth LD (Non-LD) and to adolescents who were identified as having learning disabilities matched by age (\pm 2 years) to the adolescents who had committed suicide (AS). The same examiner dictated a selection of notes based on age to all the controls individually.

4. Analysis of notes. Four raters who were blind to group membership rated all the writing samples on spelling errors and handwriting errors. Scores of the AS group (n = 27) were then compared to the scores obtained by the LD control group (n = 28) and the Non-LD (n = 41) control group on the written reproductions of the suicide notes, which were dictated to the LD and Non-LD groups. In addition, to control for the effects of stress and strong emotion, all usable suicide notes (n = 10) of the older adults who had committed suicide were scored by one of the raters for spelling and handwriting quality, using the same instruments and methodology as was used for the adolescent suicide notes. Their scores were then compared to those of the AS, the LD, and the Non-LD groups.

5. *Rating of spelling errors.* Due to the great variation in the lengths of the suicide notes, the absolute number of errors tended to increase with the length of the note. Therefore, to control for the variability in the lengths of the notes, all spelling errors were noted, recorded, and computed as a percentage of the total number of legible words in each note. Illegible words were not counted as spelling errors and were not included in the total word count.

6. Rating of handwriting. Rated samples of handwriting from the Test of Written Language (TOWL; Hammill & Larsen, 1978) were used to rate handwriting. The TOWL provides five handwriting samples that are scored from 1 (poor) to 10 (very good). These samples were provided to the four raters (blind to the group membership of the sample's writer), who then matched the participant samples as closely as possible to one of the rated

samples and assigned that score to the participant sample.

7. Rating of handwriting errors. Incorrectly formed letters, confusions (where it was obvious that a letter had been changed, e.g., an F turned into an L), and scratch-outs (where a letter or word had been scratched out, indicating a mistake) were counted, and the number of errors was computed as a percentage of the total number of legible words in the suicide note.

8. Rating of letter quality. Quality of individual letter formation was rated on a scale of 1 to 5 (1 = excellent, 5 = very poor).

9. *Interrater reliability.* Interrater reliability was established by comparing the TOWL and letter-quality scores of seven suicide notes (written by all three groups), which were independently rated by all four raters (blind to the group membership of the sample's writer). The correlations obtained among the raters were .86 (TOWL) and .78 (letter quality) agreement, respectively.

10. Suicide notes of older adults who had committed suicide. Some notes could be rated for some areas but not others. For example, typewritten notes could be rated on spelling but not handwriting. A rater who had previously rated the adolescent suicide notes rated the suicide notes of the older adults who had committed suicide for spelling errors and handwriting ability using the same methodology and criteria.

Results

Spelling

The percentage of spelling errors by group are presented in Table 1. Significant differences in levels of spelling errors were found among the groups, F(3, 104) = 22.08, p < .0001. It was found that the adolescents who had committed suicide, Scheffé F =16.47, p < .05, and the adolescents with LD, Scheffé F = 9.85, p < .05, had significantly higher percentages of spelling errors than the Non-LD adolescents. It was also found that the adolescents who had committed suicide, Scheffé F = 8.0, p < .05, had a significantly higher percentage of spelling errors than the older adults who had committed suicide. Although the adolescents who had committed suicide had a higher percentage of spelling errors than the adolescents with LD, this difference did not reach statistical significance. No significant differences existed in percentage of spelling errors between the Non-LD adolescents and the older adults who had committed suicide.

Handwriting

The TOWL Writing subtest scores by group are presented in Table 1. Significant differences were found among the groups, F(3, 87) = 11.76, p < .0001. It was found that both the adolescents who committed suicide, Scheffé F = 6.11, p < .05, and the adolescents with LD, Scheffé F = 4.70, p < .05, had significantly lower scores on the Writing subtest than the Non-LD adolescents. The adolescents who committed suicide also had significantly lower scores than the older adults who committed suicide, Scheffé F = 6.55, p < .05. No significant differences existed between the older adults who had committed suicide and the Non-LD group, nor were any significant differences in scores found between the adolescents who had committed suicide and the adolescents with LD.

Handwriting Errors

Significant differences existed among the groups in percentage of errors (scratch-outs, omissions, and confusions) in writing, F(2,89) = 14.33, p < .0001. The results are presented in Table 1. The adolescents who committed suicide, Sheffé F = 13.22, p < .05, and the adolescents with LD, Sheffé F = 5.59, p < .05, had significantly higher percentages of errors in writing than the Non-LD adolescents. No significant difference was found between the adolescents who had committed suicide and the adolescents with LD.

Letter Quality

Significant differences were found among groups in the quality of individual letter shapes, F(2,87) = 14.32, p < .0001. The results are presented in Table 1. The adolescents who committed suicide, Scheffé F = 13.81, p < .05, and the adolescents with LD, Scheffé F = 4.19, p < .05, had significantly poorer scores than the Non-LD adolescents. No significant difference existed between the adolescents who had committed suicide and the adolescents with LD.

Distribution of Spelling Errors Within Groups

The distribution of spelling errors within groups is presented in Table 2. In all, 89% of the adolescents who com-

	% sj er	celling rors	Handwriting (TOWL) ^a		Letter quality ^b		Letter errors	
Group	М	SD	М	SD	м	SD	М	SD
Adolescent suicides	6.75	(4.62)	4.32	(2.00)	3.86	(.77)	9.52	(8.00)
With LD	5.38	(4.36)	5.00	(2.45)	3.22	(1.09)	6.78	(5.73)
Without LD	.90	(1.25)	6.78	(1.67)	2.53	(.95)	2.46	(2.13)
Older (65+) suicides	1.18	(2.11)	7.72	(1.70)	2.00	(1.03)	1.85	(2.33)

TADIE 1

Note. TOWL = Test of Written Language.

^aTOWL scores range from 1 to 10 (10 = *excellent*, 1 = *very poor*). ^bLetter quality scores range from 1 to 5 (1 = *very good*, 5= *very poor*).

JOURNAL OF LEARNING DISABILITIES

mitted suicide and left legible notes had more than 2% spelling errors and did show evidence of deficits similar to those of adolescents with LD. An examination of individual suicide notes showed that there were two cases where the writers appeared to be highly intelligent but possibly psychotic. In both these cases, although the content was somewhat bizarre and incoherent, the quality of the spelling, grammar, and vocabulary was judged by raters to be average. In another case, where there were specific and clear external stressors (suicide a year after an accident in which the adolescent was seriously injured and was left with chronic pain), there was also little evidence of learning problems. Although no statistically significant differences in percentage of spelling errors existed between the adolescents who committed suicide and the adolescents with LD, an examination of the withingroup distribution of scores showed that the percentage of adolescents who committed suicide who had more than 2% spelling errors (89%) was higher than the percentage of adolescents with LD who had more than 2% spelling errors (71%). It was also found that 25% of the adolescent controls with LD and 62% of the older adults who committed suicide had no spelling errors, whereas all of the adolescents who committed suicide had spelling errors.

Kinds of Spelling Errors

Although we could not reliably measure or categorize the kinds of spelling errors or the level of spelling ability of the adolescents who committed suicide, their vocabulary was generally judged by the raters to be below expectations for age and the spelling errors to be ones that normally achieving adolescents with an average age of 17.7 years and a high school education would not be expected to make. Words that were misspelled by the adolescents who committed suicide included such misspellings as Jume for June, theas for these, ben for been, wois for was, whipe for wipe, mutch for much, maby for maybe, espically for especially, and regreat for regret.

Grammar and Syntax

Suicide Notes of Older Adults

In contrast to the adolescents who committed suicide, all but one in the older group of adults who committed suicide showed a good grasp of vocabulary, grammar, punctuation, and

TABLE 2 Comparison of Spelling Errors Within Group										
				S	pelling	errors				
	n	0%		< 1%		1%-2%		2%+		
Group		n	%	n	%	n	%	n	%	
Adolescent suicides	27	0	0	0	0	3	11	24	89	
With LD	28	7	25	0	0	7	4	20	71	
Without LD	41	24	59	1	2	6	15	10	24	

capitalization, and tended to use complex sentences, in spite of the number of stressors, the level of stress, or the strong emotion that may have been present prior to the suicides.

Discussion

The data showed that the suicide notes of the adolescents who committed suicide had significant deficits in spelling and a number of aspects of written language, including handwriting ability as measured by the TOWL, number of scratch-outs, omissions/ confusions, and quality of individual letter shapes, that were similar to those found in the written language samples of the adolescents with LD. The adolescents who committed suicide were also significantly more impaired than a comparison group of older adults who committed suicide, suggesting that the deficits found in the writing of the adolescents who committed suicide probably were not the result of extreme stress or strong emotion but, rather, were a true reflection of their usual performance and actual abilities.

What can we conclude from these data? It has been well established that many children, adolescents, and adults with learning disabilities show significant deficits in written expressive language, including difficulty in forming letters, grammar and syntax, punctuation, and spelling (Blalock, 1981; Bruck & Waters, 1988; Cordoni, 1979; Gregg, 1983; Vogel, 1987; Vogel & Moran, 1982). Therefore, if the frequency and types of deficits observed in the suicide notes are similar, in a statistically significant manner, to those of adolescents who are known to have learning disabilities, it is reasonable to assume that, in the absence of confounding factors that could produce similar results, a high percentage of the adolescents who committed suicide may have had learning disabilities.

It is also possible that the subgroup who wrote suicide notes differed from the group who did not write suicide notes, and thus the findings cannot be generalized. However, the findings in this study were similar to those of previous studies that have found no significant differences between adolescents who leave suicide notes and those who do not (Curran, 1987; Frederick, 1977; Shaffer, 1974, 1988).

Confounding Factors

In interpreting these data we must also examine factors that could have confounded the results. This study was retrospective in design and shares the limitations of all retrospective studies, in that not all case reports were given in sufficient detail to answer all our questions; furthermore, it is possible that some answers given by the survivors were influenced by "folk" beliefs about suicide and its causes. Also, in Ontario, freedom-of-information legislation, which governs confidentiality, prevents researchers from contacting families or friends of the deceased or accessing any confidential records, including school or medical records. Thus, we were unable to perform psychological autopsies to confirm the data and completely rule out other recognized risk factors in suicide that can affect cognitive function, such as depression, psychiatric illness, and alcohol and substance abuse (Brent et al., 1988; Lester, 1991; Shaffer, 1988). According to the data in the coroners' files, 22% of the adolescents who committed suicide and left notes were reported to have a previous psychiatric history, 14% had a history of addictions, and 22% had measurable levels of blood alcohol at the time of death. These prevalence rates were not significantly different from those of the complete sample of adolescents who committed suicide. Although it did not reach statistical significance, there was a trend indicating that individuals who had been drinking at the time of death were less likely to leave a suicide note than those who were not drinking. There was not enough information available to be able to establish the prevalence of specific psychiatric diagnoses, but, as there were autopsies that included blood-alcohol levels, the prevalence rate for blood alcohol is accurate. Although these prevalence rates are lower than those found in similar studies in the United States, they are consistent with the prevalence rates found by Garfinkel and Golombek (1983) in their study of 1,554 adolescents who committed suicide in Ontario in the 1970s.

Depression. The possible effects of depression on cognitive function cannot be entirely ruled out. However, although it has been established that depression negatively affects cognitive functioning in a number of areas, including free recall, attention and concentration, memory, and verbal functioning, there is no evidence that depression specifically affects spelling ability or quality of handwriting (Kinsbourne, 1988). In addition, if the deficits were caused solely by cognitive impairment due to depression, one would expect to see the same cognitive effects in the older adults who committed suicide, as there is also a high rate of depression in this population (Barraclough, Bunch, Nelson, & Sainsbury, 1974; Roy, 1983).

In the present study, the adolescents who committed suicide were significantly more impaired than the older adults who committed suicide, indicating that it is unlikely the errors are the result of cognitive deficits caused by depression.

Drug and Alcohol Abuse. The possible effects of drug and alcohol abuse also cannot be definitely ruled out. However, given the prevalence rates in the sample, this would, at best, account for less than 25% of the sample; and, again, these effects were not found in the sample of older adults who committed suicide and who had similar prevalence rates of drug and alcohol abuse (Duckworth & McBride, 1994).

Emotional and Psychological Stress. The possible effects of stress must also be considered. As this was a retrospective study, we could not directly measure stress; however, it may be that emotional stress is not as significant a factor as previously thought in cases of adolescent suicide. Recent research studies have found that adolescents who are suicidal fear death less than nonsuicidal adolescents and often view death as an attractive state, where life will continue under improved conditions (Lester, 1991; Orbach, Kedem, Gorchover, Apter, & Tyano, 1993). Thus, they feel little anxiety at the thought of approaching death.

In addition, we were able to compare the suicide notes of adolescents who committed suicide with those of older adults who committed suicide from the same geographic area and within the same time period. The a priori expectation would be that the older group's notes would be of poorer quality than the adolescents', as many of them suffered from severe physical and mental illnesses that may have affected their cognitive processes and motor coordination. In addition, the two samples represented different cohorts, with the elderly group all born before World War II, when educational levels were generally lower than those of recent years. The data confirmed that neither spelling nor quality of handwriting was significantly impaired in this population when compared to that of non-LD adolescents who were not suicidal.

It is probable that risk factors such as depression, psychiatric illness, and alcohol and substance abuse had some effect on the cognitive functioning of the adolescents who committed suicide. However, given the lack of effect of these same risk factors on the older adults who committed suicide, it is unlikely that the deficits in spelling and handwriting can be solely attributed to these factors.

Causal Interrelationships

If further research supports a connection between adolescent suicide and learning disabilities, then what is the mechanism of such a connection? Many individuals with learning disabilities do not commit suicide; therefore, having a learning disability is not a sufficient condition to result in suicide in the absence of other factors. However, there is evidence that children and adolescents with unrecognized, poorly treated, or untreated learning disabilities are at a higher risk of developing secondary behavior problems and psychiatric disorders than those who have received adequate intervention (Silver, 1989, 1993). In the present study, based on the information available, none of the adolescents who committed suicide had been identified as learning disabled or were receiving special education help.

It is also possible that behavioral and psychiatric problems are another manifestation of basic neurological dysfunctions associated with some types of learning disabilities. Therefore, those at risk for certain kinds of learning disabilities may also be at risk for psychiatric disorders and the behaviors associated with these disorders, such as poor impulse control and low frustration tolerance, which may impair their ability to handle stress and thus predispose them to commiting suicide impulsively as a response to stress (Cantwell & Baker, 1977; Hunt & Cohen, 1984).

The deficits associated with learning disabilities, such as poor problemsolving skills, poor social skills, and difficulty in interpersonal relationships, may also predispose an individual to suicide (Hazel & Schumaker, 1988; Rourke et al., 1989). Poor social skills and difficulty in interpersonal relationships can lead to social isolation and inadequate or nonexistent social support systems, which in turn are high-risk factors for developing depression, which is a high-risk factor for suicide (Brown & Harris, 1986). Poor problem-solving skills can, in turn, restrict an individual's ability to see a solution other than suicide when faced with what appears to be an insurmountable problem. Poor problemsolving skills can also cause an individual to experience many negative life events, which then put him or her at high risk for both depression and suicide (Brown & Harris, 1989).

Summary

It was found that the adolescents who committed suicide showed in their suicide notes evidence of deficits in spelling and handwriting similar to those found in the written samples of the adolescents with LD. These deficits were not found in the suicide notes of the older adults, indicating that these deficits cannot be solely the result of stress or other recognized risk factors (e.g., depression, psychiatric illness, drug and alcohol abuse) but may be a reflection of the actual performance of the adolescents who committed suicide. The data indicate that learning disabilities may be an underrecognized risk factor in adolescent suicide. If further research supports these findings, there are important implications for both suicide prevention and intervention. Routine screening for learning disabilities within school populations, child and adolescent psychiatric populations, and young offender populations may help prevent further unnecessary and tragic deaths.

ABOUT THE AUTHORS

Hazel E. A. McBride, PhD, conducts research in the areas of learning disabilities, suicide, and depression in the Appalachian region of eastern Kentucky. Linda S. Siegel, PhD, is the Dorothy C. Lam Professor of Special Education at the University of British Columbia. She has conducted research in the areas of learning disabilities, cognition and language development, psychological assessment, reading, prematurity, and the evaluation of at-risk children. Address: Hazel E. A. McBride, PO Box 1565, Hazard, KY 41702.

AUTHORS' NOTES

- 1. We would like to thank the chief coroner of Ontario, Dr. James Young, and his staff, in particular Cathy Craig and June Frank, for their support of this research.
- 2. This research was supported in part by a grant from the Natural Sciences and Engineering Research Council of Canada to L. S. Siegel.

REFERENCES

- Barraclough, B., Bunch, J., Nelson, B., & Sainsbury, P. (1974). A hundred cases of suicide: Clinical aspects. *British Journal* of Psychiatry, 125, 355-373.
- Berman, A. L. (1986). Notes on turning 18 (and 75): A critical look at our adolescence. Suicide and Life-Threatening Behavior, 16, 1–12.
- Berman, A. L., & Jobes, D. A. (1991). Adolescent suicide: Assessment and intervention. Washington, DC: American Psychological Association.
- Blalock, J. (1981). Persistent problems and concerns of young adults with learning disabilities. In W. Cruickshank, & A. Silvers (Eds.), Bridges to tomorrow: The best of ACLD Vol. 2 (pp. 35–55). Syracuse, NY: Syracuse University.
- Boyd, J. H., & Moscicki, E. K. (1986). Firearms and youth suicide. *American Jour*nal of Public Health, 76, 1240–1242.
- Brent, D. A., Perper, J. A., & Goldstein, C. E. (1988). Risk factors for adolescent suicide: A comparison of adolescent suicide victims with suicidal inpatients. *Archives* of General Psychiatry, 45, 581–588.
- Brown G. W., & Harris, T. O. (1986). Stressor, vulnerability and depression: A question of replication. *Psychological Medicine*, 16, 739–744.
- Brown G. W., & Harris, T. O. (1989). Life events and illness. New York: Guilford.
- Bruck, M., & Waters, G. (1988). An analysis of the spelling errors of children who differ in their reading and spelling skills. *Applied Psycholinguistics*, 9, 77–92.
- Cantwell, D. P., & Baker, L. (1977). Psychiatric disorders in children with speech and language retardation. Archives of General Psychiatry, 34, 583-591.
- Cordoni, B. (1979). Assisting dyslexic students: An experimental design at a university. *Bulletin of the Orton Society*, 29, 263–268.
- Curran, D. K. (1987). Adolescent suicidal behaviour. New York: Harper & Row.
- Diekstra, R. F. W. (1988, June). City lifestyles. World Health, pp. 18-19.
- Diekstra, R. F. W. (1992). Epidemiology of suicide: Aspects of definition, classification, and preventive policies. In P. Crepet, G. Ferrari, S. Platt, & M. Bellini (Eds.), Suicidal behaviour in Europe (pp. 15-45). Rome: John Libbey CIC.
- Duckworth, G. S., & McBride, H. E. A. (1994, May). Depression and suicide in the elderly: A tragedy of neglect. Poster session presented at the annual scientific

VOLUME 30, NUMBER 6, NOVEMBER/DECEMBER 1997

meeting of the American Psychiatric Association, Philadelphia.

- Frederick, C. J. (1977). Suicide in the United States. *Health Education*, 8(6), 17–22.
- Friedman, P. (1967). Foreword. In P. Friedman (Ed.), On suicide: With particular reference to suicide among young students (pp. 11-26). New York: International University Press.
- Garfinkel, B. D., & Golombek, H. (1983). Suicide behavior in adolescents. In B. D. Garfinkel & H. Golombek (Eds.), *The adolescent and mood disturbance* (pp. 189–217). New York: International University Press.
- Gregg, K. N. (1983). College learning disabled writers: Error patterns and instructional alternatives. *Journal of Learning Disabilities*, 16, 334–338.
- Hafner, H., & Schmidtke, A. (1987). Suicide and suicide research—Epidemiology and etiology. *Nervenheilkunde*, 6, 49–63.
- Hammill, D., & Larsen, S. (1978). The test of written language. Austin, TX: PRO-ED.
- Hawton, K. (1986). Suicide in adolescents. In A. Roy (Ed.), *Suicide* (pp. 135–150). Baltimore: Waverly Press.
- Hazel, J. S., & Schumaker, J. B. (1988). Social skills and learning disabilities: Current issues and recommendations for future research. In J. F. Kavanagh & T. J. Truss (Eds.), *Learning disabilities: Proceedings of the national conference* (pp. 293– 344). York, England: York Press.
- Hoberman, H. M., & Garfinkel, B. D. (1988). Completed suicide in children and adolescents. Journal of the American Academy of Child and Adolescent Psychiatry, 27, 689-695.
- Holinger, P. C., Offer, D., & Zola, M. A. (1988). A prediction model of suicide among youth. Journal of Mental and Nervous Disorders, 176, 275–279.
- Hunt, R. D., & Cohen, J. D. (1984). Psychiatric aspects of learning difficulties. Pediatric Clinics of North America, 31, 471–497.
- Jastak, S., & Wilkinson, G. (1984). The wide range achievement test-Revised. Wilmington, DE: Jastak Associates.
- Kenny, T. J., & Rohn, R. (1979). Visualmotor problems of adolescents who at-

tempt suicide. Perceptual and Motor Skills, 48, 599-602.

- Kinsbourne, M. (1988). Hemisphere interactions in depression. In M. Kinsbourne (Ed.), Cerebral hemisphere function in depression (pp. 135–162). Washington, DC: American Psychiatric Press.
- Lee, E. E. (1978). Suicide and youth. Personnel and Guidance Journal, 57, 200-204.
- Leenaars, A. A. (1988). Suicide notes: Predictive clues and patterns. New York: Human Sciences Press.
- Lester, D. (1991). The study of suicidal lives. Suicide and Life-Threatening Behavior, 21(2), 164–173.
- Livingston, R. (1985). Depressive illness and learning difficulty: Research needs and practical implications. *Journal of Learning Disabilities*, 18, 518–520.
- Maris, R. (1981). Pathways to suicide. Baltimore: The Johns Hopkins University Press.
- Orbach, I., Kedem, P., Gorchover, O., Apter, A., & Tyano, S. (1993). Fears of death in suicidal and nonsuicidal adolescents. *Journal of Abnormal Psychology*, 102, 553– 558.
- Peck, M. (1985). Crisis intervention treatment with chronically and acutely suicidal adolescents. In M. Peck, N. L. Farberow, & R. Litman (Eds.), Youth suicide (pp. 112–122). New York: Springer.
- Reynolds, W. M. (1984). Depression in children and adolescents: Phenomenology, evaluation and treatment. *School Psychol*ogy *Review*, 13, 171–182.
- Rourke, B. P. (1987). Syndrome of nonverbal learning disabilities: The final common pathway of white matter disease/ dysfunction? *Clinical Neuropsychologist*, 1, 209-234.
- Rourke, B. P. (1988). Socio-emotional disturbances of learning-disabled children. Journal of Consulting and Clinical Psychology, 56, 801–810.
- Rourke, B. P., Young, G. C., & Leenaars, A. A. (1989). A childhood learning disability that predisposes those afflicted to adolescent and adult depression and suicide risk. *Journal of Learning Disabilities*, 22, 169–174.

- Roy, A. (1983). Suicide in depressives. Comprehensive Psychiatry, 24, 487–491.
- Roy, A. (1986). *Suicide*. Baltimore: Waverly. Shaffer, D. (1974). Suicide in childhood and
- early adolescence. Journal of Child Psychology and Psychiatry, 15, 275-291.
- Shaffer, D. (1988). The epidemiology of teen suicide: An examination of risk factors. *Journal of Clinical Psychiatry*, 49 (Suppl. 9), 36-41.
- Siegel, L. S., & Heaven, R. K. (1986). Categorizing of learning disabilities. In S. J. Ceci (Ed.), Handbook of cognitive, social and neuropsychological aspects of learning disabilities (Vol. 1, pp. 95-121). Hillsdale, NJ: Erlbaum.
- Silver, L. B. (1989). Psychological and family problems associated with learning disabilities: Assessment and intervention. Journal of the American Academy of Child and Adolescent Psychiatry, 28, 319– 325.
- Silver, L. B. (1993). Problems found with children and adolescents with learning disabilites. In L. Silver (Ed.), *Child and adolescent psychiatric clinics of North America: Learning disabilities* (pp. 295–308). Philadelphia: Saunders.
- UNICEF. (1993). The progress of nations. Geneva, Switzerland: United Nations.
- Vogel, S. A. (1987). Issues and concerns in LD college programming. In D. Johnson & J. Blalock (Eds.), Young adults with learning disabilities (pp. 239–276). Orlando, FL: Grune & Stratton.
- Vogel, S. A., & Konrad, D. (1988). Characteristic written expressive language deficits of the learning disabled: Some general and specific intervention strategies. *Reading, Writing, and Learning Disabilities, 4, 89–99.*
- Vogel, S. A., & Moran, M. (1982). Written language disorders in learning disabled college students: A preliminary report. In W. Cruickshank & J. Lerner (Eds.), *Coming of age: The best of ACLD* (Vol. 3, pp. 211–225). Syracuse, NY: Syracuse University.
- Woodcock, R. W. (1973). Woodcock reading mastery tests. Circle Pines: MN: American Guidance Service.

July 6,2018

State Representative Bob Kulp State Capitol, Room 15 West PO Box 8952 Madison, WI 53708

Dear Representative Kulp,

The upcoming Dyslexia study is if of significant interest to me as a parent of a child with Dyslexia. My daughter, Lennon is eight years old and will be entering third grade in the fall. She is a bright, funny, creative, compassionate child who is currently limited in her abilities to succeed academically and emotionally in school and life because of her Dyslexia. She is not able to read past a 1st grade level and as we are often reminded; 3rd grade is when children stop "learning to read and start reading to learn". It is imperative we give Lennon and all children struggling the support and tools needed to succeed to their fullest potential.

Studies show early intervention is imperative and while Lennon is still considered within that window, we have been looking for answers since she was three years old. Consider how far along she could already be if proper diagnostic tools were in place and we would not have spent the last five years working through state and school assessments as well as spending money out of pocket for private testing and tutoring to understand why Lennon is struggling. We have spent three years moving through the process of three school related assessments, (geared toward identifying her needs and developing an IEP). Each identified what we already knew; Lennon is below average in her reading and comprehension, but because of the mandated processes required start with a process of elimination. Each assessment takes more than three months from inception to completion and since Lennon does not fit the parameters of the completed assessments we have another planned for the fall. This means another 60 days for the school to complete the testing before we meet for the results and can even discuss accommodations. Lennon will not start having the proper in school accommodations until sometime during the second half of third grade at the earliest.

Will Lennon eventually 'catch up"? As her parents we will do everything possible to ensure she reaches her full potential, however we can't alter the fact she has had to work twice as hard as her peers and will continue to do so just to achieve the same goals. We also cannot erase the emotional stress placed on her because she knows reading and spelling do not come easily to her and she is 'different'. I have watched her miss out on activities because she did not have the confidence to be in a situation without her support system. Lennon is a tough, determined little girl who works extremely hard in school; she will persevere because of her own tenacity, but it is unfair to lay that expectation on the shoulders of any young child simply because our state is not giving our educators ALL the tools and training they need to help all children. Dyslexia is not a bad word, yet teachers are hesitant to use it for fear of repercussions. I have spoken to teachers whose own children have Dyslexia and they feel doubly frustrated as they don't have the tools to help even their own children, much less their students.

Lennon has a lot on her shoulders in addition to her own struggles. Her older brother is Autistic, her father was permanently disabled in 2012 and I am now the sole provider for our family. As you can imagine the impact of all of these things has put an incredible amount of stress on our family. In 2017 we spent over \$18,000 out of pocket on medical expenses; that doesn't even include the monthly premium amount. The emotional toll is immeasurable.

I implore you to please support legislation adding Dyslexia training to educator training requirements so we can ensure effective educational services for all children struggling with Dyslexia.

Sincerely,

Cate Sabol 2139 Ramada Drive Mount Pleasant, WI 53406 <u>c8sabol@gmail.com</u>

Please take a moment to also read the Washington Post article, link below.

https://www.washingtonpost.com/lifestyle/magazine/years-of-tutoring-helped-my-dyslexic-daughter-re ad-all-kids-deserve-such-support/2017/09/27/60a81e6a-9405-11e7-89fa-bb822a46da5b_story.html?n oredirect=on&utm_term=.36d4a742356d

Testimony of in support of 2019 Assembly Bill 110 Margery Katz, MA, JD http://margerykatz.com/

Mr. Chairman, members of the Committee, thank you for the opportunity to speak here today in favor of AB 110. I will be brief.

I view AB 110 from the various hats I've worn over the years: a librarian, an attorney with an interest in juvenile justice, a former Research Clerk to the Assembly Judiciary Committee, a mom, and a Dyslexia Reading Tutor in private practice. Since 2003, I've taught approximately 50 kids with dyslexia to learn how to read.

As a former librarian, I believe strongly in providing accurate information and making information accessible to all. A guidebook would help many people find relevant information on dyslexia. If the guidebook follows the findings of the International Dyslexia Association, it will be accurate, reliable and science-based.

I've had 3 research jobs in juvenile justice. As a law clerk years many years ago, I worked on a case challenging the conditions of confinement for kids at Lincoln Hills. Over the years, I've learned there are a disproportionate number of individuals in juvenile and adult correctional facilities who cannot read. Providing accurate information on dyslexia, screening kids early on and providing evidence-based services for dyslexia would help prevent kids from entering the juvenile justice system. This bill is a step in the right direction.

If I were the Research Clerk to this Committee, I would recommend to the Chair, an amendment to AB 110. I recommend the International Dyslexia Association - Wisconsin Branch

(IDA-WI) continue to have strong representation on the advisory committee but would not recommend the same for the Wisconsin State Reading Association (WSRA). The WSRA supports Reading Recovery, which is not science-based for dyslexia.

As a mom, it's also personal. My son, Casey, who had Reading Recovery instruction in elementary school, still did not know his vowel sounds in third grade. He was at high risk for failure. Casey received evidence-based instruction for dyslexia outside the school system. He learned how to read. Casey became a member of the National Honor Society in high school and is a college graduate.

Seeing my son's success, I took training in evidence-based instruction for dyslexia. I've never met a child I could not teach to read. Recently, I got a call from a grandmother of a former student. Her granddaughter knew only the letter "K" when she began tutoring. My student had just gotten back her ACT results. She was in the 97th percentile for reading.

I believe that AB 110 will help bring about more happy endings.

Thank you.

Respectfully submitted,

Margery Katz Margery Katz, MA, JD

April 18, 2019

Hi, I am Lake Sauter Sargent and I am 10 years old. I am from Cornucopia, Wisconsin.

I am here in support of proposed bill; AB 110.

I homeschooled for most of my life but this year I started school.

When I was 5 my mom tried to teach me how to read but I was scared and I ran away and hid.

I tried going to kindergarten for a little while and they were starting to read with us and I wanted to be the last person to read and totally failed. I didn't know how to make any of the sounds and it made me sad and the kids laughed at me. I do Barton Reading and Spelling with my mom and it helped me learn how to understand letters and now I feel better about reading.

At school now I wish there was less reading and more interactive lessons not just reading and writing.

Writing is the thing that is very hard for me.

I wish the school would give me more help and help other kids. I know there are other kids in my class and school that have reading disabilities.

Thank you for giving me this time today, I was very excited to come here today and speak to you. Good Afternoon I am Jennifer Sauter Sargent from Cornucopia, WI, thank you for Committee your time.

First off I am here to state that I am "FOR" proposed bill AB 110. I wouldn't be here today if it wasn't for the information and organizing that Decoding Dyslexia Wisconsin has provided and the one on one support we have received from the nonprofit Lake Superior Tutoring Center in Iron River, WI.

Three years ago my son who is one month away from his 11th birthday was screened for dyslexia by the Lake Superior Tutoring Center. This was the only free way he could be screened for dyslexia in our region. I had been suspicious for a while that something was going on with my son and his ability to begin learning to read. Thanks to a conversation with another mother I contacted the Tutoring Center. I was shocked by the screeners first question after the screening which was "who in your family is dyslexic?" My answer was "no one". Her next statement "dyslexia is hereditary and lifelong, you don't outgrow it" completely stunned me. She sent me home with a questionnaire for my husband and I. My husband answered 8 of the 10 questions affirmatively, which heightened the suspicion that he is dyslexic but he was never screened or talked to about this as child and young adult.

I have a bachelor's degree in education. The only thing I new about dyslexia was that people who are dyslexic can reverse letters. I did not know that for roughly 20% of the population the need for deeper instruction on learning letter sounds and the rules for why words are structured the way they are is imperative. I have a much deeper understanding now thanks to my son.

I have been tutoring my son for the past 3 years using the Barton Reading and Spelling program. The non-profit Lake Superior Tutoring Center based in Iron River, WI (<u>https://lakesuperiortutori.wixsite.com/lstc</u>) provided me with a free one-day training and they provide the tutoring materials free of charge. They struggle to find volunteers to help kids and families so we decided that our best option was for me to tutor our son. In approximately two and a half years starting around age 8 he went from not knowing the sounds of any letters to reading at a 4th grade level. That does not mean it is easy for him, he gets very fatigued after reading for a short time and struggles to write.

This quote is from Decoding Dyslexia Wisconsin and I attached an article: "Science has demonstrated the most optimum time to intervene is before 9 years of age, Wisconsin data demonstrates we are <u>not</u> applying the Child Find Mandate early enough to make a difference in these students lives. Intervention can occur at any time however why should children experience failure before intervention? Dyslexia is very treatable; <u>a learning difference does not have to escalate into a disability</u>. Every child deserves the right to read."

My son began going to public school this year in 4th grade. He was homeschooled up until then. We immediately asked for a Special Education

evaluation to see if he qualified for an IEP or 504 since we know school will always challenge him. After assessments we were told that because he reads at grade level he does not qualify for additional reading and writing support but only for a 504 that offers accommodations.

We appreciate these accommodations but we feel he specifically needs the type of tutoring or group learning that I have been doing with him at home that got him to where he is today. His school wants to support him but the school does not have the tools, resources, trained staff, time, money or ability to offer him this.

I asked if I could come during school hours a couple times a week to tutor him since it is difficult after school because he is tired from the day. They said that this is not allowed since the program I use is not a curriculum approved for his instruction during school hours. So I have continued to tutor him on my own after school.

At the last meeting we had with school staff I flippantly asked the principle if I should stop tutoring him so we can see if then he may fall behind and qualify for help. The response was "oh no you shouldn't do that". The school staff listens and is working with us but they don't seem to understand dyslexia and I have basically been told I am on my own to help him.

The saddest part for me is after all the reading and learning I have done to understand my sons learning difference and how I can help and support him I now notice the same struggles in many other children who are not being supported. Most parents assume the school will detect and evaluate learning issues and know how to handle them. They trust the public schools to know more than they do when it comes to this.

All children in Wisconsin deserve to have the opportunity to grow strong literacy skills. The values of strong literacy skills are immeasurable.

Again I am here today to state that I am "FOR" proposed bill AB 110 (Dyslexia Handbook).

Thank you for your time and together we are making a difference! Jennifer Sauter Sargent

SPIRIT CREEK FARM Jennifer Sauter Sargent 24255 State Hwy 13 Bayfield, WI 54814 715-742-3551 jsautersargent@gmail.com www.spiritcreekfarm.com

April 18, 2019

Re: Support of AB 110 Developing a Guidebook related to Dyslexia and Other Related Conditions

Thank you, Representatives, for holding this hearing today. My name is Katie Kasubaski and we live in Oregon, WI in Dane County and are in the Oregon School District. I was an early reader and never fully understood struggling readers until our own children. Our daughter's reading struggles began early. She didn't enjoy looking at books, couldn't rhyme and struggled with letters. Despite a 4K teacher who had a master's degree in Reading, summer school and "extra" reading help in kindergarten she was unable to read or even sequence letters. I began to see my happy sweet daughter looking sad and anxious. While sitting in on one of her special reading sessions with 5 other kindergarteners, I discovered that the children were not taught to sound out words and use phonics. What if these teachers and I had access to some sort of resource that could have pointed us to seek someone trained in teaching kids with dyslexia at this point? If we had had this resource when our daughter was 5 years old, would our story look different?

But this is our story. We had never considered homeschooling our children, but by the end of our daughter's Kindergarten year, our daughter's anxiety about not being able to read and follow along in the classroom was too much. For her emotional health, we pulled her from public school. We searched for answers of why our daughter (and later our son) struggled to learn to read. A dyslexia screener pointed to dyslexia. After a year of paying out of pocket for tutoring and numerous attempts to teach both our children to read, I applied to become trained in Orton-Gillingham at The Children's Dyslexia Center in Madison. In the meantime, both children had complete neuropsychological exams which confirmed dyslexia. By June 2018, I had completed training at The Children's Dyslexia Center in Madison, and I now work with 3 students a week. I am also a Certified Academic Language Practitioner (CALP) through the Academic Language Therapist Association (ALTA). Decoding Dyslexia WI is working to change things here in Wisconsin where educators have NO training about dyslexia which affects approximately 30,000 Wisconsin students.

It is clear to me that teachers and parents need somewhere to turn to look for answers to help their children who struggle with dyslexia. Putting out accurate information about signs of dyslexia and how to teach children with dyslexia using evidence-based reading intervention is the least we can do for our teachers, parents and students. **Please support AB110.** Thank you!

Sincerely,

Katie Kasubaski 5483 Windridge Rd. Oregon, WI 53575 608-268-6333

Assembly Education Committee Regarding: AB 110 Dyslexia Guidebook

I am Michele Raasch. I am an educator of 19 years who has received a master in curriculum and design, a master in reading science, a 316-reading license as well as certifications as a Wilson Reading Dyslexia Practitioner and Structured Literacy Dyslexia Interventionist. I have dyslexia in my family, so I know the parental side as well as the educator side to this debate. I am sharing my ongoing journey in a world that still does not acknowledge how my children or those I teach struggle with a language-based disability known as dyslexia.

I began my journey to educate myself when I realized I was not prepared to teach a child how to read or even how to write beyond what I felt was osmosis teaching. All I need to do is expose children to literacy and they will somehow just figure it out. It made no sense to me. It became even clearer to me that this does not teach all children to read when my own children began to struggle with learning to read or spell words. I was aware of dyslexia as it was in my family. I knew I should observe my own children as I understood it is hereditary. I had conversations with a reading recovery teacher who was working with one of my children as she would tell me that my child was at a certain reading level and making great progress. I would read with my child at home and do my own running records that demonstrated exactly what my child was doing when he read. He was compensating and not truly reading. I would ask the reading recovery teacher if she was going to go through life previewing for my son every book he was going to read. If not, it was time to teach him how to read. It was at this time I knew I was going to have to educate myself and advocate for my child because the school did not have the appropriate approach to teaching reading that my child and those like him needed. The school did not even understand the why behind my child's struggle. The parent advocate became another part of how I would begin to define myself.

My role as advocate brought me to IDA or the International Dyslexia Association to find information and guidance on dyslexia. I began to become more involved in the past few years and I am now vice president of IDA-WI.

I dream of a day when parents who have children who are dyslexic and may be dyslexic themselves, are able to go into schools and know that their children are understood. That the resources and accommodations are available so that these children can succeed. Not all parents are educators like me. Not all parents had a positive school experience and can now go into a classroom and speak up for their children. It is unfair to blame the parents and make statements that I have heard "if these parents only would read with their children at home, their child would be reading" when we do not even understand or provide the appropriate instruction for these children in schools. A guidebook will bring awareness about dyslexia, provide the means for knowledgeable conversations about dyslexia and begin the progress within the state of Wisconsin so that all children can learn to read.

michlem Raasch

Written Testimony in Support of Assembly Bill 110

My name is Treva Hanford. I live at 1347 Pinehurst Lane in Neenah, Wisconsin 54956. I can be reached by cell phone at 920-585-4555. I fully support AB 110 to create a Dyslexia Handbook.

My 12-year-old son, Isaiah Hanford was diagnosed as having "twice exceptional" form of dyslexia after receiving extensive testing using the Wechsler Intelligence Scale for Children assessment. He also has a diagnosis of ADHD and anxiety. My son was not able to receive official accomodations through a written 504 Plan until he was halfway through third grade, even though his teachers and school were aware of his struggles in reading, writing, and math since the first grade. Even after Isaiah's formal diagnosis of dyslexia, Isaiah was only eligible for 504 accomodations due to his diagnosis of ADHD and anxiety. Unfortunately, the public school system does not acknowledge dyslexia and teachers have not been educated or trained in how to assist children with dyslexia.

Having a dyslexia handbook in place that educators can use to assist them with learning about dyslexia and giving specific suggestions on how to help dyslexic children best learn in the classroom will be beneficial to their long-term educational success. It will also prevent children from getting so behind and subsequently developing a low self-esteem.

Isaiah has multiple accomodations in place that are intended to be put into action by his classroom teacher. Some of these interventions include not only allowing, but providing Isaiah with audio books whenever possible. Teachers need more training in how to access and use audio books; they could also benefit from more educational assistants to ensure all needed accomodations are met. Isaiah's tests can also be read to him, which dramatically improves his test scores. He is allowed to have his homework and classroom test questions narrowed down when possible to enable him to most accurately reflect his knowledge in all areas, but not become overwhelmed. The Dyslexia Handbook will help be a guide with evidence-based rationales for educators to utilize.

The earlier a child with dyslexia can receive assistance and the appropriate accomodations, the less behind they will get and the more likely they will be to succeed when they move to the next grade level. At this time, early identification and intervention for children with dyslexia is lacking. Providing a guidebook in which educators must follow will help them be better informed and aide in the educational success of children with dyslexia.
April 18, 2019

My son, Valentino is 9 years old and was diagnosed with dyslexia in November of 2018. Valentino started 5k in a private school and very soon we came to realize something was wrong. He was not responding to letter sound recognition or site words. Quickly in October his 5k teacher suggested he repeat and was completely oblivious on how to even help him. The private school quickly put blame on me for not having Valentino enrolled into a 4k program. The private school had no resources or funding to help him. We sought outside tutoring paying \$30.00 / hour to help him twice a week. It wasn't enough and it had been suggested that he repeat 5K. It was heartbreaking and he worked so hard, but just couldn't retain the material. We opened enrolled Valentino to one of the best elementary schools in the State of Wisconsin and I drove 45 minutes everyday to take him and pick him up. Again, Valentino is having difficulty retaining the material. However, this time the school actually offered help and intervention BUT we hit another roadblock by now NOT being in the district. The school could only help him so much being he was open enrolled. He just scraped by making it to the first grade.

Now, even being in the district and Valentino having an IEP and receiving a diagnosis from outside sources and paying out of pocket to have the confirmation, my struggling little boy is still 4 reading levels behind! I have to again rely on outside tutoring sources to help with his confirmed dyslexia and pay \$85.00 / hour to start. Schools and educators have little or no knowledge to help these kids with dyslexia and they are being left way behind. Could you imagine picking up a book and just staring blankly, because you have no clue on how to read??? Could you imagine wanting to write your mother or father a note, but can't because you don't know letter sounds or how to write? These are everyday life essentials that my little boy is missing out on and still everyday he gets up excited to go to school hoping to learn to read and write.

I thank you for taking the time to read this and I ask your support for Bill AB-110, an act to create a dyslexia handbook.

Sincerely,

Brenda Narvaez W302 N6626 Lillian Drive Hartland, WI 53029 262-533-3288 islandgirl8484@gmail.com

• JALLENT ino 9 Mz \mathcal{G} enry V M kf $\langle \rangle$ THALLE M ρ 11 A 0 ۱ 0 TO 9 - 4

006 Č You 0 0 -e 01e+-0 000000 Date L 0 4 Dear MAM AND day 0000000 0 0 0 aet fish Wan tDn 0 0 CALLEP Δ Ô 0 0 0 0000 000000 OV WI 000000000 φ 000 Can't Stop Smiling Ó Q Ø 0 0 000 Ó 0 0 000 0000 ୕ୖୄୄୄ O From, alentin 000 00

Hello, my name is Connie Day I live at 17 Arbor Lane in Appleton, WI 54915. I fully support AB 110, an act to create a dyslexia handbook.

"We only know what we know when we know it." I am a K-8 Lifetime Licensed State of Wisconsin teacher, with 10 years teaching experience, 5 at the middle school level and 5 at the lower elementary level. When I finished my schooling at the University of Wisconsin Eau Claire I knew nothing of Dyslexia. I will spend the rest of my life helping as many people as I am able to understand Dyslexia, and find the help they need to be successful.

Our son, nephews, great nephew, and my brother are Dyslexic. They were all told by unknowing educators at sometime in their educational experiences that they would not amount to much because they couldn't read, write, and do math as expected and that it must be that they aren't trying hard enough.

This happens because educators, administrators, C.E.A.S.A workers, and yes even the head of the DPI, don't know what they don't know. What they don't know and I didn't know was that systematic, sequential reading instruction, providing accommodations, and modifying work is paramount to the success of students with Dyslexia. The research has been around for over 65 years and the new research continues to support it. If administrators and teachers had a guidebook proposed in Assembly Bill 110 it could short cut the amount of time it takes to identify and provide support for dyslexic students, saving time and resources. The guidebook would also indicate the accommodations and Assistive Technology to help make qualified decisions regarding remediation and supports.

Our experience getting our severely dyslexic son through school was trying, costly, and emotionally draining for our whole family. Our son will be profoundly affected his entire life by his experience, which many times was abusive, unfeeling, and mean. Yes there were a few teachers throughout his school experience that, "go it," and we will be forever grateful for their kindness, caring, and believing he wasn't stupid, and for understanding that he was trying, as hard as he possibly could. Some of the helpful teachers provided whispered thoughts on dyslexia because they weren't allowed to say it. He didn't learn to read until he received, at our expense, tutoring with a systematic, sequential reading program. Our son has moved forward with his life and is successful in many ways, but don't think he came through this without scars.

After our son completed school, I decided I had time to learn how to help other students learn how to read using systematic and sequential reading instruction. I went through training in the Orton-Gillingham method and I learned, what I didn't know about how to teach people to read. As a member of the Wisconsin Branch of the International Dyslexia Association, I took phone calls, answered emails, from parents, and helped to set up a data base of tutors, and testers for the State. I tutor students with Dyslexia, answer questions from parents, find the help they need for their children, and attend I.E.P meetings. There wasn't much help out there when our son was in school and unfortunately there still isn't. I don't want another family to experience what we did, but they do. Join a dyslexia group on the web or Face Book and what will be read are the same stories over and over about the lack of understanding by educators throughout Wisconsin and the country. I would like to believe it isn't political, or motivated by money. It costs nothing to provide good reading instruction. It also costs nothing to provide accommodations and modifications. Somehow they don't know what they don't know and by passing Assembly Bill 110 supporting the creation of a Dyslexia handbook, all will know teachers, administrators, parents, and students, so the cycle of shame, failure, and regrets, can turn into Thank you for this opportunity. success, after success, after success.

Hi, my name is Lee Erath, and I am here to support Assembly Bill 110. When I was eight years old I began the long 7 year journey to learn how to cope with my severe dyslexia. My older brother also has dyslexia and as I was struggling in school, my parents started to see the signs of dyslexia that we shared. My parents didn't realize I was dyslexic early on because I memorized the words in books but wasn't actually reading them. Over the following years I got help learning how to read, spell, comprehend, and be able to function in everyday life. My private tutor had to use a specific dyslexia program to teach me called Barton, which uses the Orton Gillingham method. Now spelling is still a huge challenge being that I spell things very logically in my own mind and I'm so creative that spell check can't even help me. Still, I am not a very strong reader and much prefer to listen to an audio book over reading. Without the help of my tutor and family I would probably never have learned to functionally read. Without the tools that have been made available to me, coping with dyslexia would be far harder if not impossible. I believe this bill would help give the tools to parents and teachers alike to be able to help others who are going through similar struggles that I have, and still continue to experience.

Thank you. Also thank you to my mom for letting me dictate this testimony to her so I didn't have to type it and spell it.

Hello, my name is Turner Erath. I am 17 and diagnosed as profoundly dyslexic. It was clear at a young age that I was dyslexic. I was in the second grade and couldn't even read the word cat. My mom and dad eventually found a private dyslexia tutor that was able to help. The beginning was very slow, starting with the very basics, and slowly moving forward. I remember sitting in my tutor's office crying because reading was so hard. I met with my tutor twice a week year round for eight years. It was a proud moment when I graduated from the program just last year. If it wasn't for my great dyslexia tutor and the support from my family, I would not be at the place I'm at today. All of the intervention I received was privately done by my family. Unlike me, many kids in the school system today don't have the accommodations that I had because dyslexia is not formally recognized in Wisconsin schools and many teachers do not know how to handle students like me. As a dyslexic, I require a specific program that is able to teach me, and kids like me, how to read and function in society. This legislation would be a good first step in recognizing the effects dyslexia has on students and it would help teachers and parents support their dyslexic kids. I'm extremely thankful for the help I have received and would wish the same for others like me.

Good morning. My name is Joy Erath and I am a parent of children with dyslexia as well as an educator. Today I am here to support Assembly Bill 110. Three of our four children are dyslexic; our 10 year old daughter and then our two sons, ages 15 and 17, who were diagnosed with severe-profound dyslexia. My husband and I, along with gracious extended family, have poured many hours of time and money into having our children professionally tested and privately tutored. We are so blessed to have found a private dyslexia tutor in our home town of Wausau who is an expert in the OG, or Orton-Gillingham system, a program proven to help dyslexic children learn to read and spell. You see, our children see the written word clearly but somewhere in the process between seeing and then understanding, those written words take a detour in their brains. It's that painfully difficult processing of the written word that has our daughter on my lap crying on Sunday nights because Monday means school. The mental and emotional anguish our children struggle through in their attempts to learn to read and spell have been painful at best. Our boys have shed many tears as they have battled through the challenges of dyslexia and still they, even with intervention, face day to day frustrations. We started this journey not knowing, with the severity of our boys' learning challenges, if they would even be functional in society. Because of the help they have received, our boys, who are now in high school, are able to keep pace academically with their peers. It might take them two or three times longer to read, and one might find humor in their unique and fascinating spelling, but we are thankful and proud of our children for their many painstaking efforts in learning to effectively cope with their dyslexia.

Consistently I am introduced to other families with dyslexic children searching for help and answers because they aren't receiving it from their schools that simply are not educated in understanding dyslexia. I consider it a privilege to offer support and expertise as I am able and am hopeful that a bill such as this would allow all parents and teachers a baseline for understanding this language disorder called dyslexia and then helping the many children, just like our own, that are climbing this uphill battle.