

NATIONAL INSTITUTE FOR LEARNING DEVELOPMENT

Workshop Syllabus

I. Workshop Description:

The Rx for Discovery Writing training is a didactic and practicum workshop. The professional learning provides pre-school through third-grade educators with foundational understandings from brain research on how handwriting develops from a biological and cognitive development perspective and the instructional implications. Specific topics include the neurobiological basis for handwriting, handwriting and written expression development, and multi-modal development of writing skills. Educators will explore how handwriting impacts the brain and examine the link between handwriting, reading, and spelling. Mediated learning is the overarching instructional approach used to facilitate the norms, learning tasks, and discourse in the educational context. The training focuses on broadening educators' conceptions of multi-modal instructional practices that support handwriting and writing success for all learners. Key handwriting and written expression instruction include graphomotor skills, orthographic-motor integration, orthographic processing, cognition, language, and writing traits.

A. **Evidenced-based:** Based on a meta-analysis research from the Institute of Education Sciences (*Teaching Elementary Students to Be Effective Writers: Practice Guide Summary*; What Works Clearing House Practice Guide, 2018)

B. **Philosophy:** Multi-modal, structured approach based on “The Big Picture of Writing” and the “Simple View of Writing” (Berninger, 2002) within a mediated learning instructional framework (Feuerstein, 1996)

C. **Instruction:** Didactic and practicum learning experiences with hands-on, role-playing activities and lesson plan development

D. **Assessment:** Participants will practice implementing a writing lesson plan with a small group and receive feedback on their demonstrations. Proficiency with designing and implementing multi-modal lesson plans that include the 6+1 writing traits will be assessed as well as the use of mediated learning instructional framework.

II. Workshop Objectives:

A. **General:** Successful completion of this workshop will enable educators to use evidenced-based strategies to teach Pre-K - 3rd grade students basic handwriting and written expression skills.

B. **Specific:** Upon completion of this workshop, participants will be able to:

1. Understand the neurological basis of writing development and what educators should know about teaching handwriting
2. Articulate why handwriting is important and how it is related to reading, spelling, written composition, and thinking
3. Articulate the Big Picture of Writing and the Simple View of Writing

4. Understand the 6+1 writing traits and how to develop students' writing traits
5. Use a multi-modal approach to design and implement handwriting and written expression lesson plans
6. Implement Mediated Learning as the instructional methodology in handwriting and written expression instruction
7. Conduct informal assessments of students' handwriting and written expression skills

III. Workshop Resources:

- A. Rx for Discovery Writing – Fundamentals *training manual* (provided by NILD)
- B. Research and Journal Articles (provided below and in the training manual)

IV. Workshop Requirements:

A. Asynchronous Learning Activities

1. Watch four didactic PowerPoint lectures

- Neurobiological basis of Writing Development
- Multi-Modal Writing: Language by Ears, Eyes, Mouth, Hand, Mind, and Heart
- 6+1 Traits of Writing
- Mediated Learning

2. Read five research/journal articles

- [Early Development of Language by Hand: Composing, Reading, Listening, Speaking Connections: Three Letter-Writing Modes; and Fast Mapping in Spelling](#) (Berninger et al., 2006)
- [Cursive Writing: The Right Way to Write](#) (Ryff, 2019)
- [How Words Cast Their Spell](#) (Joshi, Treiman, Carreker, & Moats, 2008)
- [Teaching Elementary School Students to Be Effective Writers](#) (WWC Practice Guide Summary, 2018)
- [Where Does Handwriting Fit In? Strategies to Support Academic Achievement](#) (Cahill, 2009)

3. Review online resources and watch four videos:

Resources

- Can you imagine a world without handwriting? <https://www.zaner-bloser.com/HW21Summit/index.html>
- What are the 6+1 Traits? <https://educationnorthwest.org/traits/trait-definitions#ideas>
 - 6+1 Trait Writing Rubrics: [K-2](#); [3-12](#)

'Handwriting in the 21st Century? An Educational Summit' videos:

- A meta-analysis of the effectiveness of teaching handwriting (Santangelo & Graham) <https://www.zaner-bloser.com/HW21Summit/research-santangelo.html>
 - [Handouts](#)
- Evidence-based, developmentally appropriate writing skills K to 5: Teaching the orthographic loop of working memory to write letters, spell words, and express ideas (Berninger) <https://www.zaner-bloser.com/HW21Summit/research-berninger.html>
 - [Handouts](#)
- The neural correlates of handwriting and its affect on reading acquisition (Harmon James) <https://www.zaner-bloser.com/HW21Summit/research-harman-james.html>
 - [Handouts](#)
- Kinematic and clinical correlates of handwriting in elementary school children (Conti) <https://www.zaner-bloser.com/HW21Summit/research-conti.html>
 - [Handouts](#)

B. Synchronous Learning Activities

1. Engage in lectures and practicum activities
2. Observe instructor implementing a lesson plan
3. Create a handwriting/written expression lesson plan
4. Implement a lesson plan while role-playing with other participants

C. Workshop Workload

1. Asynchronous learning – time required is approximately 8 hours
2. Synchronous learning – time required is 8 hours

V. References

Berko G. J. (2005). *The development of language* (6th ed.). Pearson Education.

Berninger, V., Abbott R., Jones, J., Wolf, B., Gould, L., Anderson-Youngstrom, M., Shimada, S., & Apel, K. (2010). Early Development of Language By Hand: Composing, Reading, Listening, and Speaking Connections; Three Letter- Writing Modes; and Fast Mapping Spelling. *Developmental Psychology*, 29:1,61-92.

Berninger, V., Vaughan, K., Abbot, R., Begay, K., Coleman, K., Curtin, G., Hawkins, J., & Graham, S. (2002). Teaching spelling and composition alone and together: Implications for the simple view of writing. *Journal of Educational Psychology*, 94, 291-304. doi:10.10317//0022-0663.94.2.291

Cognitive Research Program. (1996). *Mediated learning in and out of the classroom*. Arlington Heights, IL: IRI/SkyLight Training and Publishing, Inc.

Cooper, A. (2021). *The importance of posture and positioning for handwriting.*

<https://childrensupportolutions.com/the-importance-of-posture-and-positioning-for-handwriting>

Cormier, D., Bulut, O., McGrew, K. & Frison, J. (2016). The role of Cattell-Horn-Carroll (CHC) cognitive abilities in predicting writing achievement during the school-age years. *Psychology in the Schools, 53*(8), 787- 803. doi: 10.1002/pits.21945

Fellowes, J., & Oakley, G. (2014). *Language, Literacy and Early Childhood Education*, (2nd ed., p. 358). Oxford University Press.

Institute of Education Sciences (2018). Teaching Elementary School Students to Be Effective Writers. What Works Clearinghouse Practice Guide Summary. Retrieved from https://ies.ed.gov/ncee/wwc/Docs/practiceguide/wwc_writingpg_summary_092314.pdf

Joshi, R. M., Treiman, R., Carreker, S., & Moats, L. C. (2008). How words cast their spell. *American Educator, 32*(4), 6-16.

Ryff, T. (2019). The right way to write.

Wise, R. (2021). *East-to-follow tips to help a child with handwriting & pencil grip.*

<https://educationandbehavior.com/teaching-proper-pencil-grip-to-develop-or-improve-handwriting/>

Your Therapy Source. (2020, July 1).

<https://www.yourtherapysource.com/blog1/2020/07/01/factors-affect-handwriting-speed/>