



Crosswalk with Virginia's Early Learning and Development Standards

About LENA

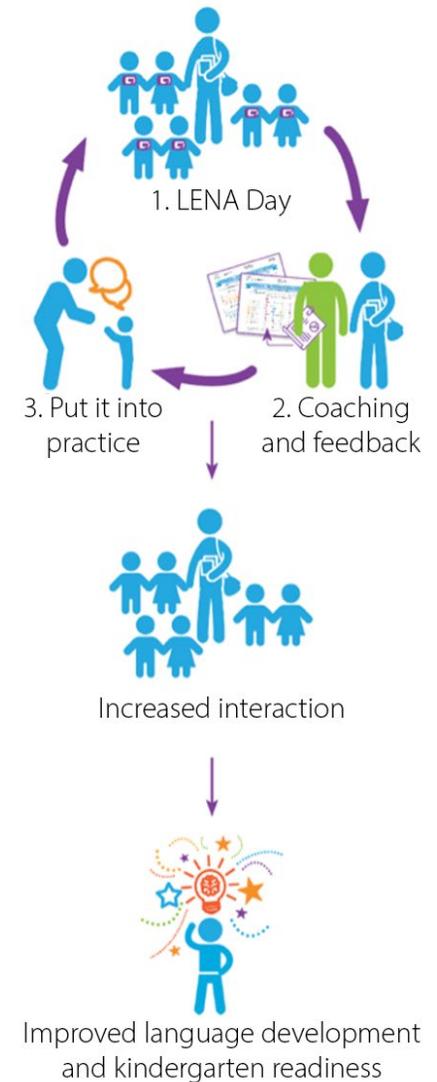
LENA is a national nonprofit on a mission to transform children's futures through early talk technology and data-driven programs. LENA's early talk technology, sometimes referred to as a "talk pedometer" or a "FitBit for conversation," is the global standard for measuring early language environments, including conversational turns. Visit www.LENA.org or email info@LENA.org to learn more about how LENA Grow supports early childhood teachers' professional development.

How LENA Grow Supports

[LENA Grow](#) is a practice-based professional development program that helps teachers equitably improve classroom language environments in early learning settings complementing Virginia's Early Learning and Development Standards. To measurably improve equitable interactions with each child in their care, teachers participate in LENA Grow's five-week reflective feedback cycle. The cycle employs LENA's "talk pedometer" technology, strengths-based coaching, and early talk strategies to measurably increase conversational turns, one of the most predictive metrics of child outcomes.

LENA Grow helps teachers form a reflective practice habit that supports language development and builds responsive relationships reinforcing Virginia's guiding principle that an available, responsive adult is the most important support in a young child's learning. As teachers begin to talk *with* each child rather than *to* the children, they learn how to adapt their interactions to support each child's development. Just as Virginia's Early Learning and Development Standards serve teachers across a wide variety of settings, LENA Grow is implemented in a variety of early learning settings throughout the U.S., including private/state-funded child care centers, family child care homes, and Early Head Start and Head Start programs.

How LENA Grow Works



Core Elements of LENA Grow

These elements work together to provide a cohesive, empowering professional development experience for teachers that drives meaningful and lasting increases in interaction. This change leads to more equitable language environments, higher TS GOLD® and CLASS® scores, accelerated language development, and increased teacher job satisfaction and self-efficacy.

1. **Research base:** LENA Grow is rooted in over a decade of peer-reviewed research linking conversational turns to improved language, brain, and social-emotional development. More than 400 researchers and clinicians in over 40 countries have used LENA technology to study early language development.¹
2. **Early talk strategies:** At each coaching session, teachers receive research-based curriculum materials that provide strategies for increasing interactive talk. Areas of focus include personal care, transitions, indoor play, outdoor play, mealtimes, shared reading, early math, early literacy, and songs & rhymes.
3. **LENA Room Report:** At each coaching session, teachers review the Room Report, which provides objective interaction data on overall room averages and child-specific averages. It quantifies the number of conversational turns in the classroom across the day.
4. **LENA Child Report:** At each coaching session, teachers review the Child Report, which provides a detailed view of each individual child's experience across the day, including hourly counts of interactions and child vocalizations that highlight further engagement opportunities for teachers. This report is also used to engage families in a conversation about their child's early talk experiences and language development.
5. **Weekly strengths-based coaching:** LENA Grow coaches provide 30-60 minutes of coaching each week. The Coach Guide supports them in bringing a strengths-based lens to the data analysis and goal setting conversation with teachers.
6. **Weekly goal setting, documentation, and practice:** At each coaching session, the teacher sets a specific and measurable goal for the coming week. The teacher then documents progress toward that goal as they practice integrating early talk strategies throughout the week, including the next LENA Day.
7. **Family Engagement:** A Family Talk handout is provided each week for teachers to send home. Teachers also spend one coaching session developing a family engagement strategy and making plans for how they will engage families in extending quality interactions into the home setting.

How LENA Grow Supports Virginia Early Learning and Development Standards

LENA Grow supports each area of the Virginia Early Learning and Development Standards by improving the early talk environment for children, focusing specifically on the quantity and quality of adult-child interaction. As such, LENA Grow places a special emphasis on Communication, Language and Literacy Development, which is aligned in more detail in the next table.

Virginia Early Learning and Development Standards		How LENA Grow Supports
Area	Sub-areas	
Approaches to Play and Learning	APL1. Curiosity and Initiative	LENA Grow provides strategies that promote curiosity, initiative, problem-solving and persistence. During the reflective feedback cycle, teachers receive strengths-based coaching, review classroom- and child-level data, set measurable goals, and practice new strategies that support children's approaches to play and learning. Teachers receive research-based curriculum materials that provide ideas on how to effectively engage young children during indoor and outdoor play.
	APL2. Creativity and Imagination	
	APL3. Executive Functions and Cognitive Self-Regulation	
	APL4. Behavioral Self-Regulation	
Social and Emotional Development	SED1. Positive Self-Concept	LENA Grow helps teachers foster positive, responsive adult-child relationships. Teachers receive research-based curriculum materials that provide ideas on how to effectively engage young children during times of the day that may be stressful for them, including personal care routines and transitions. They also practice strategies for promoting socialization during mealtimes. Peer-reviewed research has established a causal link between increased conversational turns and improved social-emotional competencies in the first three years of life. ² Furthermore, research has shown LENA Grow to have impacts on children's social and emotional health, including improved DECA (Devereux Early Childhood Assessment) scores. ³
	SED2. Emotional Competence	
	SED3. Interacting with Others	
Communication, Language and Literacy Development	CLLD1. Communication	LENA Grow supports interactive talk among teachers and children, promoting language development and communication. Teachers receive research-based curriculum materials that provide strategies on how to increase interactive talk by creating joint attention, increasing conversational turn-taking, and recasting. Areas of focus include shared reading, early literacy, and songs & rhymes. Children in LENA Grow classrooms have shown increases in TS GOLD® scores ⁴ and LENA Developmental Snapshot scores. ⁵ In addition, peer-reviewed research has shown a link between increased conversational turns in preschool settings and improved vocabulary scores. ⁶
	CLLD2. Foundations of Reading	
	CLLD3. Foundations of Writing	
Health and Physical Development	HPD4. Physical Health and Self-care	LENA Grow helps teachers build interactive talk into care routines. Teachers receive research-based curriculum materials that provide ideas on how to effectively engage young children during times of the day that include physical health and self-care. Areas of focus include personal care routines, transitions, and mealtimes.

Cognitive Development	CD2. Social Science: People, Community, and Culture	<p>Teachers receive research-based curriculum materials that provide strategies on how to effectively engage young children, creating joint attention, increasing conversational turn-taking, and recasting. Areas of focus include indoor play, outdoor play, songs and rhymes, mealtimes, and early math. During the LENA Grow sequence, teachers practice new strategies to scaffold children’s cognitive development.</p> <p>Peer-reviewed research has linked conversational turns to brain structure,⁷ brain function,⁸ reading skills,⁹ and executive functioning¹⁰ early in life, as well as IQ scores and language skills in adolescence.¹¹</p>
	CD3. Mathematics	
	CD4. Fine Arts	

How LENA's 14 Talking Tips Support the Communication Area

LENA's early talk strategies, the 14 Talking Tips, are research-based techniques for increasing early talk and supporting healthy language development. Three research-based "active ingredients" power the 14 Talking Tips: creating joint attention, increasing conversational turn-taking, and then recasting.¹² Conversational turns support children's developmental progression in emerging language and literacy. **This chart dives deeper into the area of Communication to illustrate how LENA's 14 Talking Tips align with specific communication goals.**

Language Development and Communication (LDC)		14 Talking Tips													
		1: Talk about what you're doing and thinking.	2: Comment on what they're doing or looking at.	3: Name things that they're interested in.	4: Get down to their level: face to face.	5: Touch, hug, hold.	6: Tune in and respond to what they look at, do, and say.	7: Wait for their response.	8: Imitate them, and add words.	9: Make faces, use gestures.	10: Take turns — don't do all the talking.	11: Repeat and add to what they say and do.	12: Follow their lead, do what interests them.	13: Encourage them, be positive.	14: Be silly! Relax and have fun!
Communication	CLLD1.1. Understanding verbal and nonverbal cues	✓	✓		✓	✓			✓	✓		✓			
	CLLD1.2. Using vocabulary and nonverbal cues to communicate conversational interactions		✓	✓				✓				✓	✓		
	CLLD1.3. Learning and engaging in conversational interactions				✓			✓	✓		✓			✓	✓

References

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- ¹ LENA Foundation (2023). LENA's impact is powered by partnerships. <https://lena.org/where-are-LENA-programs>
- ² Gómez, E., & Strasser, K. (2021). Language and socioemotional development in early childhood: The role of conversational turns. *Developmental Science*, 24(5). <https://doi.org/10.1111/desc.13109>
- ³ LENA Foundation (2022, September 2). Research shows links between LENA Grow participation and social-emotional growth. *LENA Blog*. <https://www.lena.org/research-shows-links-between-lena-grow-participation-and-social-emotional-growth/>
- ⁴ Dynia, J. (2022). *The Impact of a Language-Based Intervention with Individualized Coaching in Early Childhood Education Classrooms* [White paper]. SproutFive Center for Early Childhood Innovation. https://drive.google.com/file/d/1dIN71WcKQ_FZAxnTWOWfNQiHmCoAXCul/view
- ⁵ LENA Foundation (2022, February 1). Preliminary findings suggest LENA Grow accelerates language development. *LENA Blog*. <https://www.lena.org/lena-grow-developmental-snapshot-preliminary-results/>
- ⁶ Duncan, R., et al. (2022). Predictors of preschool language environments and their relations to children's vocabulary. *Infant and Child Development* 32(1). <https://doi.org/10.1002/icd.2381>
- ⁷ Romeo, R., et al. (2018). Language Exposure Relates to Structural Neural Connectivity in Childhood. *Journal of Neuroscience* 38(36): 7870-7877. <https://doi.org/10.1523/JNEUROSCI.0484-18.2018>. Huber, E., et al. (2023). Language Experience During Infancy Predicts White Matter Myelination at Age 2 Years. *Journal of Neuroscience* 43(9): 1590-1599. <https://doi.org/10.1523/JNEUROSCI.1043-22.2023>
- ⁸ Romeo, R., et al. (2018). Beyond the 30-Million-Word Gap: Children's Conversational Exposure Is Associated with Language-Related Brain Function. *Psychological Science* 29(5). <https://doi.org/10.1177/0956797617742725>
- ⁹ Weiss, Y., et al. (2022). Language input in late infancy scaffolds emergent literacy skills and predicts reading related white matter development. *Frontiers in Human Neuroscience* 16. <https://doi.org/10.3389/fnhum.2022.922552>
- ¹⁰ Romeo, R., et al. (2021). Neuroplasticity associated with changes in conversational turn-taking following a family-based intervention. *Developmental Cognitive Neuroscience* 49. <https://doi.org/10.1016/j.dcn.2021.100967>
- ¹¹ Gilkerson, J. et al. (2018). Language experience in the second year of life and language outcomes in late childhood. *Pediatrics* 142(4). <https://doi.org/10.1542/peds.2017-4276>
- ¹² Warren, S. (2015). *Right from Birth* [White paper]. LENA. https://info.lena.org/hubfs/RightFromBirth_Warren.pdf