

RIGHT FROM THE START

*Enriching Learning Experiences
for Multilingual Learners
through Multiliteracies*

—

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CAL
CENTER
FOR APPLIED
LINGUISTICS

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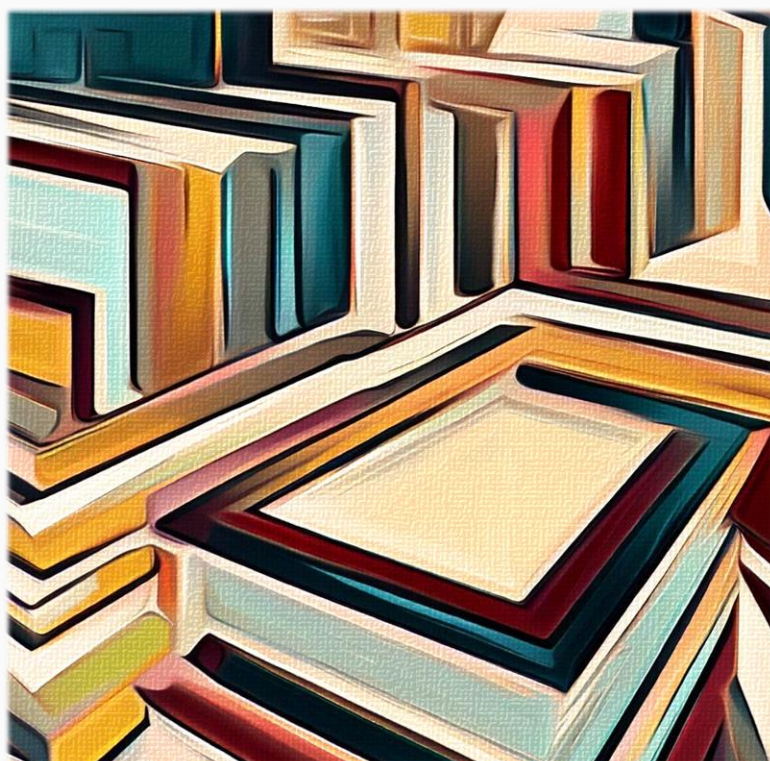
Executive Summary

Designed for educators in preK-12 settings, this position paper examines the policies and practices associated with the expansion of the construct of literacy to multiliteracies and its implications for enhancing teaching and learning for multilingual learners.¹ This theoretical and pedagogical elaboration, as originally defined by The New London Group (1996), posits that multilingual learners experience, comprehend, and interpret the world through a variety of design perspectives, languages, cultures, and modalities. In accepting this premise, we reify the movement of bilingualism and multilingualism from reductionism to holism (Jessner, 2018) and support language and literacy learning as integral to multilingual learners' cultural development (Vygotsky, 1978).

Research upholds the uniqueness of bilingual and multilingual individuals in their ability to use their linguistic and cultural capital to achieve reading comprehension success (Peets et al., 2022). In accepting multiliteracies as foundational to enriching students' literacy development, we accept bilingualism and multilingualism as the norm and an ever-present resource for multilingual learners at home, in school, and for life (de Jong, 2022). By underscoring the growing heterogeneity of the student population alongside evolving technologies as the touchstones of multiliteracies, we honor the linguistic and cultural strengths of multilingual learners and facilitate their agency and empowerment (Rajendram, 2015).

For multilingual learners, the continual presence of multiliteracies in their school and home environments sparks early literacy and biliteracy practices in which the Science of Reading can be subsumed. When visualizing multiliteracies, biliteracy, literacy, and structured literacy (the Science of Reading) hierarchically as a nested figure, these constructs become complementary, no longer incompatible but building on and strengthening each other. Rather than perpetuating a debate with no resolution, we envision how multiliteracies can deepen the learning experiences for multilingual learners that encompass varied language policies and pedagogical practices.

*“To survive in
this new world,
it is important
to be multiliterate.”
– Drenoyianni, 2006*



¹ The term ‘multilingual learners’ is meant to include preK-12 students who are or have been exposed to multiple languages or are learning in more than one language at home or in school. It intends to accentuate the value of multiple languages over one and to instill pride and belonging in students and families.

Introducing Multiliteracies

The first-grade co-teachers encourage students to actively engage in learning by interacting with each other to reach their mutually agreed-upon targets. In their classroom, students have opportunities throughout the day to rotate among three multimodal exploration stations: (1) 'let's express ourselves' with art supplies, writing tools, recording devices, computers and tablets, audio versions of bilingual books, puppets, props; (2) 'let's solve problems,' with abacuses, puzzles, blocks, plastic shapes, letter and word magnets, whiteboards; and (3) 'let's get moving' with music, traffic signs, a large floor map, different modes of transportation, and board games. Teachers invite students to bring artifacts from home to supplement the stations and welcome family members to lend their expertise and join in the student-generated activities.

This student-centered self-discovery classroom exposes multilingual learners to multiliteracies while building their self-regulation, confidence, and agency. Its language policy encourages the use of multiple languages, including translanguaging, as multilingual learners simultaneously develop oral language, literacy, and conceptual understanding in a warm, welcoming environment. Teachers converse with students in the moment, noticing and offering concrete, actionable feedback as they document student learning and growth.

Various contexts support multilingual learners' development of multiliteracies, which entails understanding, creating, and interpreting

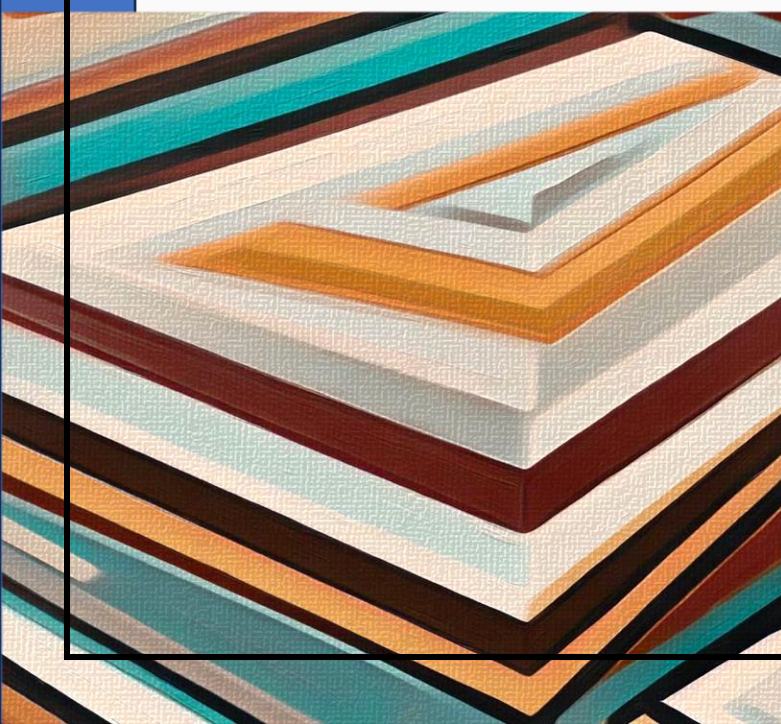
meaning through different modes of communication as students engage in learning. Whether these spaces are centers in primary classrooms or instructional options for middle and high schoolers, multimodal literacy (Serafini, 2014), along with student choice and voice (Kuhl et al., 2021), should prevail during teaching and learning. Basically, research on multiliteracies reveals pedagogies that encompass its two dimensions—the multiple modes of meaning-making, including technology, and the diversity of learners (Kuiju et al., 2018).

In the pages ahead, we unveil a stance, rationale, and justification for accepting the transcultural, cross-linguistic, and multimodal nature of multiliteracies for the superdiverse student population of multilingual learners. We examine the role of standards-based reform, the application of the scientifically informed Universal Design for Learning framework to cultural variability (Chita-Tegmark et al., 2010), and the multifaceted nature of multilingualism in building multilingual learners' metacognitive, metalinguistic, metacultural awareness and, as Soltero (2016) adds, 'meta-bilingual' awareness. In essence, we call for recentering literacy instruction and classroom assessment to be more inclusive, equitable, and empowering for multilingual learners. The Addendum juxtaposes multiliteracies and the Science of Reading to help the educational community better understand the multilingual stance (de Jong & Gao, 2019) and quell some common misunderstandings.

Literacy and Multilingual Learners

With Gutenberg's introduction of letterpress printing to Europe in the early 15th century, we entered a modernizing information revolution that resulted in the spread of literacy across the globe. Fast forward 500 years. With Berners-Lee's invention of the World Wide Web and its dissemination through public domain software at the close of the 20th century, society collectively joined the digital information age. These distinct forms of literacy form the heart of education and are the primary markers of success in school and beyond.

How would one define literacy today? Although the pendulum of teaching pedagogies, policies, and practices tends to sway, the prevailing conceptualization of literacy in U.S. schools has endured.



Overall, educators envision literacy instruction and assessment as follows:

- Text bound, dependent on print
- Code-based in a controlled sequence
- Reflective of standard language
- Restricted to rule-governed forms of language
- Monoglossic, interpreted through a monolingual lens
- Monocultural, seen from a unitary Anglocentric perspective

So where do multilingual learners fit into this definition? In large part, these students, whose richness resides in their multiple languages and cultures, are not considered as literate as their monolingual counterparts as defined by standardized reading tests in English (see U.S. Department of Education NAEP reports, e.g., <https://bit.ly/3r2oSdX>). To counter this belief, we introduce multiliteracies, multimodalities, and multilingualism to classroom instruction

and assessment. This more refined, relevant, and sophisticated vision draws from research-based evidence on multilingual learners' language, literacy, and biliteracy development.

Recent Reviews of Research on Literacy Development for Multilingual Learners

Since the beginning of the millennium, many major reports have pointed to the inherent misapplication of research findings based on monolingual students to multilingual populations (de Houwer, 2022; Escamilla et al., 2022; Herrera et al., 2022). These biases can be attributed, in part, to educators who hold English as the gold standard and neglect to acknowledge the simultaneous development of language and literacy by multilingual learners that often occurs in multiple languages. Table 1 summarizes the conclusions of reports that support the unique role of literacy development for multilingual learners.

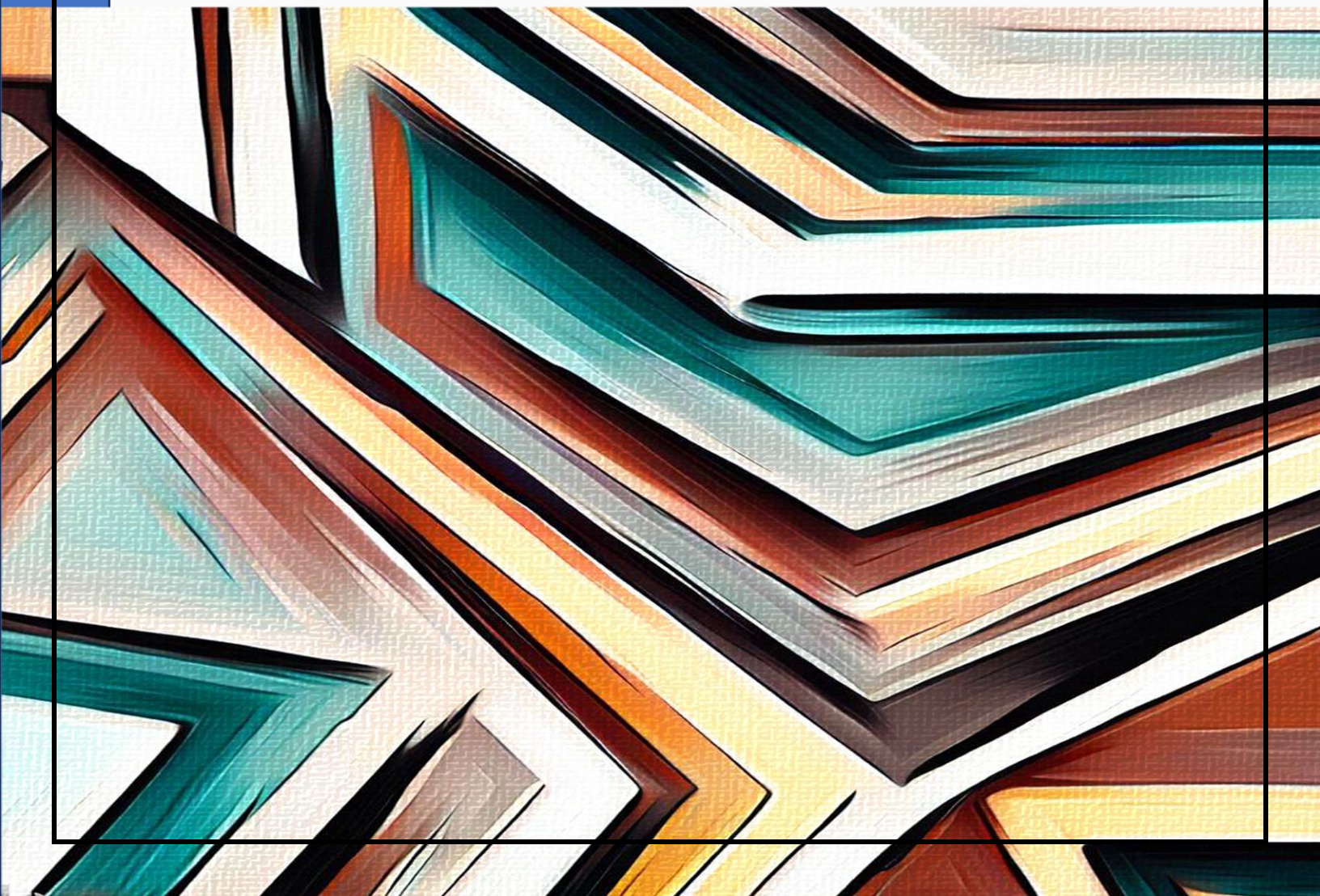


Table 1

Conclusions from Major Reports on Literacy and Multilingual Learners

<i>Literacy Report</i>	<i>Conclusion</i>
<i>National Literacy Panel on Language-Minority Children and Youth</i> (August & Shanahan, 2006)	The five basic components of reading instruction—phonemic awareness, phonics, fluency, vocabulary, and comprehension—are requisite but insufficient for multilingual learners. For these students, oral language is foundational to literacy development, and biliteracy is advantageous for language development.
<i>National Academies of Sciences, Engineering, and Medicine</i> (2017)	Given ‘adequate exposure to two languages, young children have the capacity to develop competence in both; with exposure to two languages, young children have the capacity to develop competence in vocabulary, morphology, syntax, and pragmatics in both’ (p.4).
<i>National Academy of Education</i> (Pearson et al., 2020)	Reading is a cultural activity where ‘language drives every facet of reading comprehension’...and ‘importance (is placed on) both word and world knowledge in explaining comprehension development, especially for inferential reasoning and comprehension monitoring’ (p.3).
<i>National Committee for Effective Literacy</i> (Escamilla et al., 2022; Herrera et al., 2022)	Current literacy development trends reflect a reductionist literacy approach that is overly focused on English-centric discrete reading skills for young multilingual learners. What is more appropriate and effective for multilingual learners are well-rounded cultural and linguistically responsive practices that respond to the assets of multilingual learners.
<i>A Framework for Foundational Literacy Skills Instruction for English Learners: Instructional Practice and Materials Considerations</i> (The Council of the Great City Schools, 2023)	What is needed is a more ‘comprehensive and connected approach to foundational literacy skills development that involves grade-level instruction.... (as currently) English learners experience foundational skills instruction in English (that are) heavily focused on code-based skills (and) built on findings from research on how monolingual English speakers learn to read English text’ (p. 7).

Bilingual and multilingual communities, along with dual language advocates who envision biliteracy as an educational goal, have challenged the normalized view of a single pathway to literacy. Other educators of multilingual learners who see the advantages of building strong identities around students’ strengths have also contested a monoglossic perspective. In essence, much of the educational community working with multilingual learners has come to accept and appreciate a heteroglossic stance with its assets-based orientation (Blair et al., 2018), multimodal

linguaging practices (Creese & Blackledge, 2010), and semiotic modes of communication (Bailey, 2007; Danielsson & Selander, 2021). As a result, we are seeing a shift in literacy practices to those more accepting of the strengths of the whole student with the understanding that classroom teachers can implement multilingual multiliteracies pedagogies with positive results for their students (Ntelioglou et al., 2014).

From Literacy to Multiliteracies

Debate continues over which reading pedagogy is most effective for all students. This conflict boils down to a polarity in linguistic orientation (Gottlieb, 2022b). Structuralism, which currently manifests itself in the Science of Reading, is generally perceived as a series of linguistic conventions. It emphasizes language as a bound system of rules that consists of discrete connections among a hierarchy of sounds, words, and sentences. Socioculturalism, on the other hand, presents itself in multiliteracies; it envisions the 3 Ls, literacy, language, and learning, as social activities that are situationally bound and geared to an overall purpose or function. As educators, it would be advantageous to accept Paradis's (2004) assertion that although structuralism serves a legitimate function, it does not suffice when viewing bilingualism. Bilingualism relies on neurolinguistic and sociocultural perspectives, including metalinguistic and metacultural knowledge and pragmatics.

This position paper is not an indictment of traditional structuralist literacy practices, nor does it take a stance against literacy as an alphabetic representation of meaning. It intends to ask the education community to reflect on what constitutes literacy for multilingual learners and to think of how to inject linguistic and cultural sustainability and digital literacy into instruction and assessment. Its underlying stance is that the current vision of literacy for multilingual learners is too restrictive and must expand to represent multiple communication channels. We contend that multiliteracies, with its sensitivity to context, languages, and cultures, encompasses a more comprehensive view of multilingual learners' positionality as students seamlessly move across a situationally dependent variety of spaces (Gottlieb, 2022a).

The two prongs of multiliteracies represent student interaction and navigation in today's world (The New London Group, 1996). One

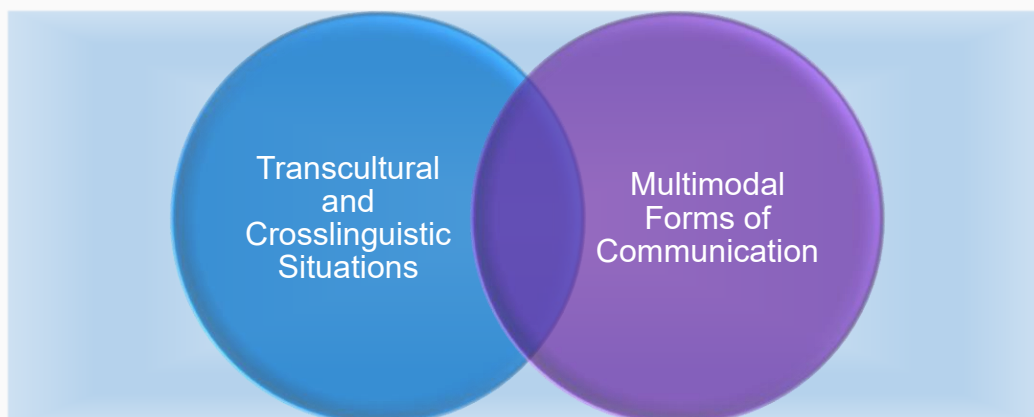
dimension encompasses the sociocultural situations that enable learners to decipher differences in patterns of meaning. These differences take cultures, gender, life experience, and subject matter into account, making every exchange a cross or transcultural one. Thus, curriculum, instruction, and assessment that are built around multiliteracies, by definition, are linguistically and culturally sustainable.

The second dimension of multiliteracies recognizes and embraces the characteristics of our new information age and its associated communications media. It professes that meaning is constructed in increasingly multimodal ways, where written-linguistic modes seamlessly interface with oral, visual, audio, gestural (kinesthetic), tactile, and spatial patterns of meaning. Broadening the scope of literacy to include multiliteracies that is inclusive of multimodal, experiential, and cultural contexts of learning benefits multilingual learners.

Figure 1 illustrates the dovetailing of the two 'multis' or dimensions of multiliteracies (Kalantzis & Cope, 2010). In it, we see the interaction between one's life worlds (as presented in social and cultural situations) and modes of communication (as depicted in its many forms). In essence, the conceptualization of multiliteracies is wrapped around the following:

1. The interpretation of varied and unique experiences of our student population; that is, multilingual learners as members of a globalized society and their engagement in learning activities; in essence, *its transcultural and cross-linguistic nature*
2. The explosive use of technologies (e.g., the internet, artificial intelligence) that has influenced how we retrieve and process information—*its multimodal nature*—and the subsequent emergence of new genres and forms of communication.

Figure 1

The Intersecting Dimensions of Multiliteracies

We treat multiliteracies as an intermingling of languages, cultures, and modalities, where pedagogy is built around what learners bring to the classroom and their connections to home and community (Kafle & Canagarajah, 2015). Thus, we can best understand multiliteracies through a sociocultural lens as it describes learning as relevant to multilingual learners' unique social, cultural, and linguistic experiences (Tricamo, 2021). To reflect this new reality, there must be a shift in teaching and learning.

Multiliteracies enhances and enriches literacy practices, serving to supplement, not supplant, what has traditionally been in place in our schools.

Recentering Literacy

Since the start of the millennium, two forces in education have had an impact on each of us. These are technology along with the other touchstones of multiliteracies: multilingualism and multiculturalism. The changing nature of literacy practices reinforces the need to develop new assessments that address multimodal texts designed 'for' learning, not just 'of' learning (Cope et al., 2011; Gottlieb, 2016) and student self-reflection to evoke multilingual engagement in and control over their cognitive activities in assessment 'as' learning (Earl, 2013; Gottlieb, 2021; Jessner, 2018). Consequently, teachers

must develop instructional strategies and assessment practices to answer contemporary digital demands and linguistic realities.

Multiliteracies represents an expanded way of thinking and acting about the teaching of literacy within linguistic and culturally rich contexts for learning. This pedagogy creates conditions for a socially just society (The New London Group, 1996). In response to how education must adapt to meet the needs of our multimodal society, multiliteracies broadens the scope of literacy beyond the printed word to recognize the many varieties of language and other sources of meaning. In fact, the pedagogy of multiliteracies has become one of communication and knowledge representing all subject areas (Cope & Kalantzis, 2015).

Features of Multiliteracies

Conceptualized as a literacy pedagogy to transform the teaching of English (Kalantzis & Cope, 2010), multiliteracies soon spread to one applicable to bilingualism and multilingualism (Lo Bianco, 2000; Ntelioglou et al., 2014). In essence, the multiliteracies pedagogy has come to adopt a broader vision of literacy to represent the wider cultural practices of our growing linguistically plural society. Table 2 briefly describes features of multiliteracies and their applicability to instruction and classroom assessment for multilingual learners.

Table 2

Features of Multiliteracies and Their Implications for Instruction and Assessment

<i>A pedagogy of multiliteracies...</i>	<i>Where multilingual learners have opportunities to</i>
Encompasses multilingual learners' understanding and creating meaning from their interactions with multiple languages, including translanguaging practices	Crisscross their languages and cultures in crafting products, projects, or performances as evidenced in criteria for success
Helps shape the positive identities of multilingual learners by embracing their linguistic and cultural uniqueness	Capitalize on their 'funds of identity' as the basis for their literacy and learning experiences (Esteban-Guitart & Moll, 2014)
Taps different combinations of modalities (e.g., textual, audio, visual, graphic, oral, kinesthetic, linguistic)	Co-plan with their teachers to show evidence for learning by choosing from a variety of modes
Offers a range of literacy pathways where multimodal resources, including technology, combine with content and language	Develop multiliteracies by integrating language(s) and content through multimodal choices that are authentic to the situation
Leverages bilingualism or multilingualism as an underlying trait and strength of multilingual learners	Think and act as bilingual or multilingual persons in school, at home, and around the community

In addition to acknowledging and appreciating the growing multilingual student population, The New London Group scholars convey a powerful message that boasts of our increasing reliance on technology as a communication mode and teaching tool. Technology has become

so pervasive in society that it is intertwined with how we live, our daily routines, and our surroundings, so much so that reading has moved from the page to the screen while writing has moved from the pen to the image (Kress, 2003).

Multiliteracies

Why? *To respond to dramatic changes in everyday life brought about by technology and its increased modes of communication in conjunction with cross-linguistic and transcultural connections brought about through globalization*

What? *Patterns of communication coupled with multimodalities where learners negotiate differences in meaning from context to context*

How? *By connecting pedagogical practices for multilingual learners to relevant, engaging, and expansive communication venues*

– Adapted from Cope & Kalantzis, 2015

Orientations of Multiliteracies

Learning occurs when students are immersed in meaningful practices based on their backgrounds and experiences (The New London Group, 1996). Learning within a multiliteracies pedagogy consists of actions that rely on multimodal media such as writing, computers, diagrams, images, and sound recordings to expand student thinking. Originally categorized

as four components of multiliteracies, these actions have evolved into orientations. Essentially, they revolve around 'knowledge processes'—experiencing, conceptualizing, analyzing, and applying learning across various contexts (Cazden, 2006; Gee, 2004; Kalantzis & Cope, 2010). Table 3 briefly describes multiliteracies' four orientations and their implications for instruction and assessment for multilingual learners.

Table 3

Multiliteracies' Orientations and Their Implications for Instruction and Assessment

<i>Multiliteracies Orientation</i>	<i>Brief Description</i>	<i>Examples for Multilingual Learners</i>	<i>Implications for Instruction and Assessment</i>
Experiencing	'Cultural weavings' between school and life experiences create and solidify cross-connections that ground meaning based on real-world contexts and authentic texts.	In bringing traditions of home to school and school to home, multilingual learners readily make crosslinguistic and transcultural references.	Knowledge should not be confined to school learning; multilingual learners should draw from multiple sources in their homes and communities.
Conceptualizing	The content area 'Knowledge Process' involves learners as active conceptualizers.	Students engage in inquiry-based learning (e.g., Socratic seminars).	Multilingual learners should routinely self-reflect in assessment <i>as</i> learning.
Analyzing	In examining text functions, students interrogate the interests of participants in the communicative process.	Multilingual learners interject their own cultural interpretations into purposes of text.	Multilingual learners' unique perspectives should be accepted as viable expressions of learning.
Applying	Learning entails the transfer of knowledge to complex and diverse real-world situations.	Multilingual learners use an array of communicative modes to personalize their stories and histories.	Multilingual learners' extensive language and cultural insights should be embedded in instruction and assessment.

The Influence of Standards-based Reform on Multiliteracies

For multilingual learners, the standards-based movement accompanied by federal accountability has been part of the U.S. educational landscape since the turn of the century. Required under ESEA legislation, state academic content standards and English language development or proficiency standards have been the anchors for curriculum, instruction, and assessment in the K-12 arena. Although multimodalities are mentioned in the most recent iteration of standards, its treatment has not been systemic.

The added dimensions of multiliteracies in pedagogy and practice are cause for combining elements of state academic content standards, language development standards, and

technology standards to capture a full complement of learning expectations for multilingual learners. While educators are aware of technology as a platform for instruction and assessment, they may not be familiar with the International Society for Technology in Education (ISTE) standards for students and teachers.

Adopted by all states, ISTE standards are 'designed to empower student voice and ensure that learning is a student-driven process.' The focal areas of these standards exemplify technological aims and advancements that are in concert with student-driven instruction and assessment. Table 4 outlines the interplay among state academic content, language development or proficiency, and technology standards involved in advancing multiliteracies in teaching and learning.

Table 4

The Influence of Standards on Multiliteracies for Multilingual Learners

<i>State Academic Content Standards</i>	<i>Language Development Standards</i>	<i>International Society for Technology in Education (ISTE) Standards</i>
Grounded in a variety of learning theories	Generally grounded in sociocultural theory	Grounded in learning science research
Focused on content area/disciplinary knowledge, concepts, and skills	Focused on effective use of language	Focused on the effective use of technology
Integrated disciplinary practices in learning activities	Integrated content and language reflected in disciplinary practices within learning activities	Integrated computational thinking practices in learning activities
Intended for all students	Intended for multilingual learners with recognition of all students	Intended for all students, educators, education leaders, and coaches

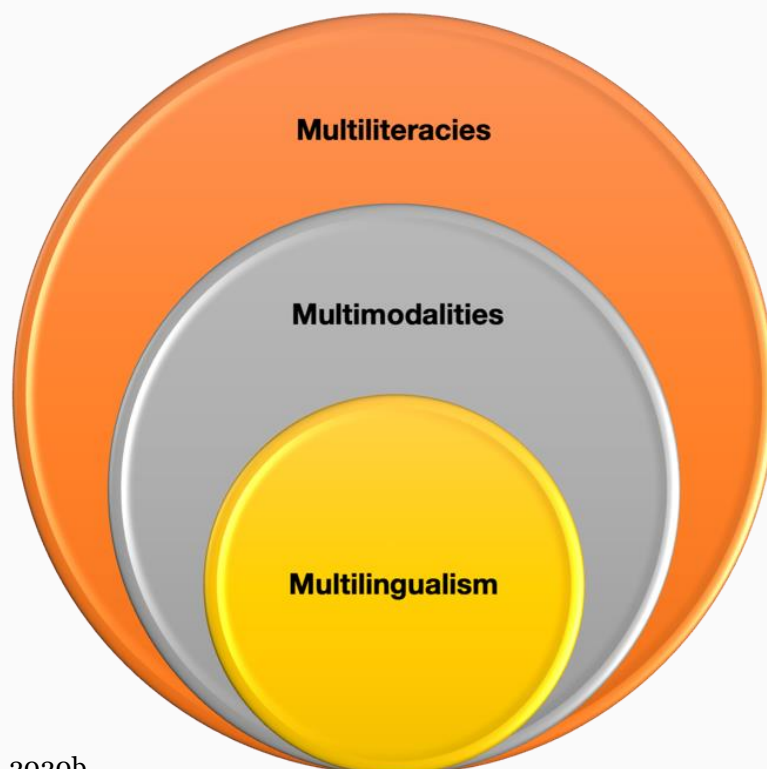
Multiliteracies as an Expression of Multimodalities and Multilingualism

The introduction of multiliteracies has been a game changer for rethinking how to approach teaching and learning, especially for multilingual learners and other minoritized students. This new view of learning responds to the prevalence of images and other modes of

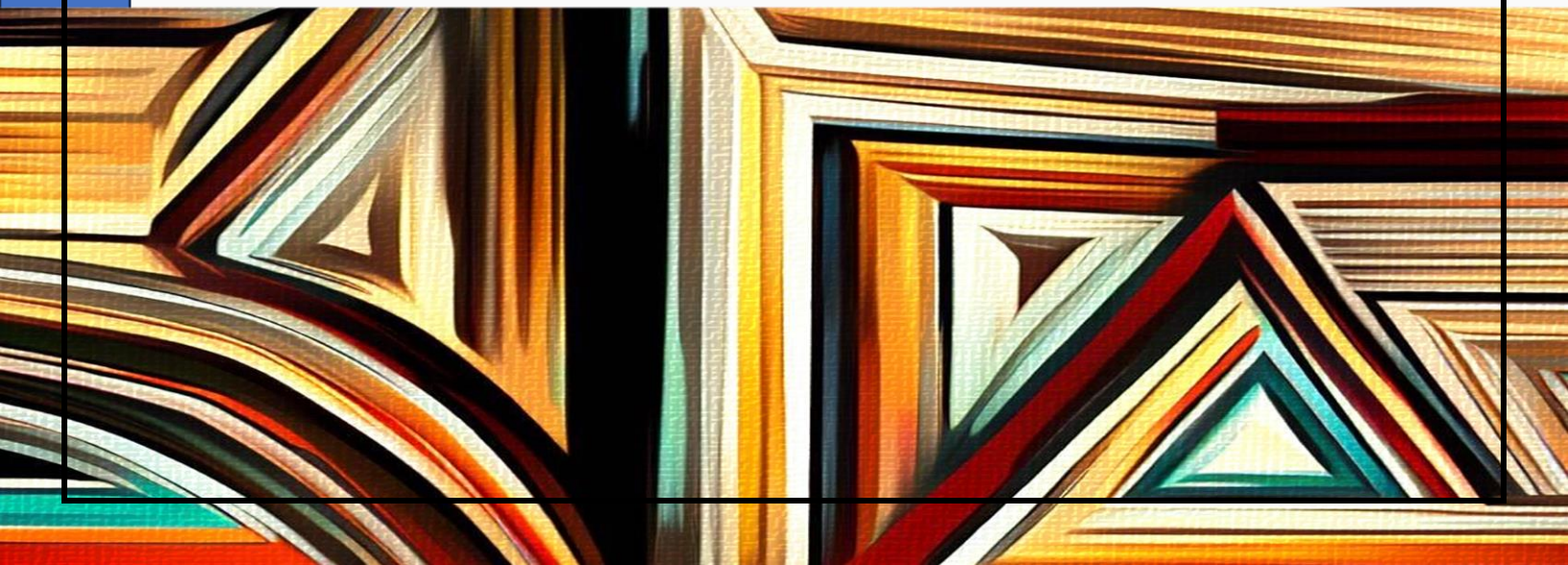
communication as sources for making meaning (Jewitt, 2006). Multiliteracies can be a stimulus for multilingual learners' increased access to and interpretation of content-focused language instruction and language-focused content instruction. As illustrated in Figure 2, two related constructs support multiliteracies for multilingual learners: multimodalities and multilingualism.

Figure 2

Centering Multilingual Learners' Learning Experiences: The Nesting of Multilingualism and Multimodalities Within Multiliteracies



Adapted from Gottlieb, 2020b



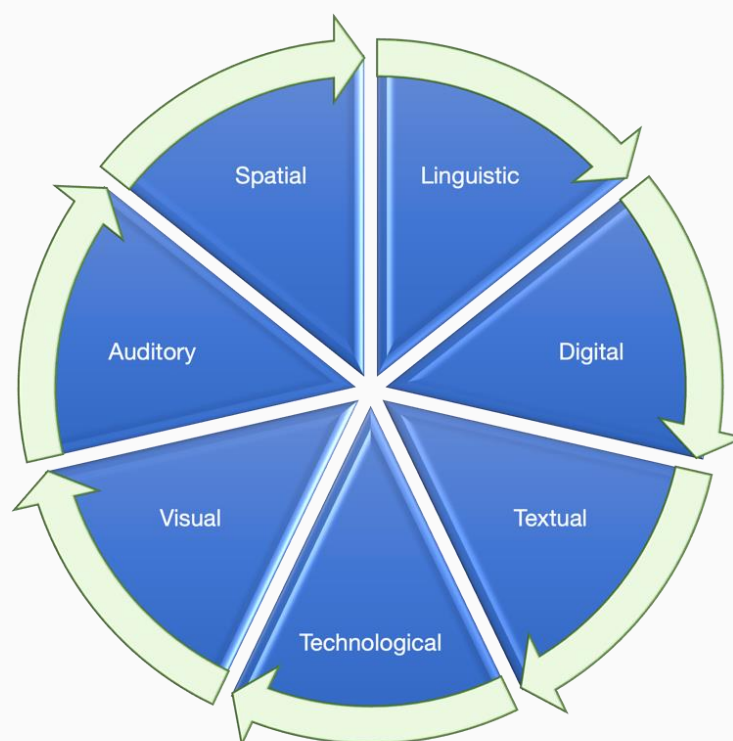
The Influence of Multimodalities on Multiliteracies and Learning

Teaching and learning are, by nature, multimodal in that they occur through the combined modes of text, speech, writing,

actions, images, and gestures. When working with multilingual learners, there are additional linguistic considerations, such as the interplay between languages. Figure 3 depicts multimodal representations useful for instruction and assessment.

Figure 3

Adding Meaning to the Message: The Different Forms of Multimodalities



Multimodalities are the combined use of different modes of communication (e.g., text, graphics, art, and technology), while multiliteracies is understanding and creating meaning using these blended modes (Castro & Gottlieb, 2021). While the concepts of multimodalities and multiliteracies are unique, they often merge in the classroom. Where there are multilingual learners, multilingualism serves as an additional sense-making resource, and with advanced technologies becoming more and more part of school and family life, multiliteracies is becoming increasingly connected to sense-making through multimodalities. In addition, the emergence of multimodal assessment during instructional routines allows teachers to help students expand their ways of expressing learning in this digital age (Hung et al., 2013).

“Together, the linked concepts of multiliteracies and multimodalities constitute a new way of conceptualizing how teaching and learning occurs in contemporary classrooms.”

– Stein & Newfield, 2006

We assert that multimodalities, especially when prompted by student choice and negotiation, offer multilingual learners viable opportunities to engage in and demonstrate their learning (see ISTE student standard 1.1, Empowered Learner). By doing so, we can further say that multimodal pathways to learning are empowering for multilingual learners. For teachers,

multimodalities extend ways to assist students in reaching their learning goals and thus are an effective scaffold for promoting learning (ASCD, 2022).

In school, multimodalities are important in language and literacy development. Here the combination of images, aural, linguistic, spatial, visual, and written means of communication are resources multilingual learners can access during learning to bolster their comprehension. For multilingual learners, multimodal approaches to instruction and assessment may

also include translanguaging as a resource for language and literacy development (Gottlieb, 2022; Schall-Leckrone, 2022). Table 5 gives classroom examples of the five mode designs that combine to form multimodalities (The New London Group, 1996), where each mode accentuates a distinct avenue for making meaning.

Table 5

Sources of Multimodal Design and Examples

<i>Linguistic Design</i>	<i>Audio Design</i>	<i>Spatial Design</i>	<i>Gestural Design</i>	<i>Visual Design</i>
Oral language (e.g., conversations, interviews)	Prepared speeches	Aerial maps	Facial expressions	Imagery
Written language (e.g., forms, poetry)	Oral stories	Physical maps	Movement	Blueprints
	Lectures	3-D representations	Simulations	Photos
Organization of language (e.g., genres-blogs, essays)	Music	Objects	Dance	Cartoons
	Closed caption videos	Placement of information (e.g., on pages, websites, or posters)	American Sign Language	Diagrams
				Murals
				Graphics

The use of multimodalities can positively impact students' literacy development and bolster assets-driven instruction and assessment for multilingual learners, multilingual learners with disabilities, and other minoritized populations that historically have been marginalized (Arias, 2022). With multiple venues as entrees to meaning, multilingual learners' brains become stimulated, which, in turn, facilitates and reinforces comprehension. The learning environment becomes more inviting as teachers cater to students' linguistic strengths, multisensory experiences, and preferences.

There has been a long history of multimodal instructional strategies in the simultaneous treatment of grade-level content and language for multilingual learners (Crandall, 2012; Leung, 2022; Short & Fitzsimmons, 2007). In addition,

the U.S. government's What Works Clearinghouse (Baker et al., 2014) strongly recommends that teachers strategically use multimodal instructional tools— such as short videos, visuals (demonstrations, 3-D models), and graphic organizers—to anchor instruction and help students make sense of content. The integration of content and language coupled with multimodalities is also apparent in English language development standards frameworks (WIDA, 2021), classroom assessment (Gottlieb, 2016), and instructional practices (Barton, 2023). The use of multimodalities, as contributors to multiliteracies, is effective for all students.

If multimodalities are a planned curricular component and essential to instruction for multilingual learners, then multimodal

resources, including multiple languages, should readily be made available for assessment. However, their presence is rather scant. To date, there is not consensus on how to resolve the tension between contextualizing aspects of multilingual learners' languages and cultures while simultaneously meeting the requirements of often monolingual (English) assessment demands (May & Dam, 2015). Although there is not yet a strong body of empirical research, emerging data point to the potential of multimodal classroom assessment for providing more comprehensive and accurate information about what multilingual learners can do in specific content areas (Grapin & Llosa, 2022).

Multimodalities and Universal Design for Learning for Multilingual Learners with Disabilities

Having multiple modes represented during instruction and assessment is a basic tenet of Universal Design for Learning (UDL), a scientifically informed framework crafted to optimize teaching and learning. Created by the Center for Applied Special Technology (CAST, 2018), UDL aims to reach each student

irrespective of their learning needs. In doing so, it focuses on increasing equitable learning opportunities and outcomes for multilingual learners (Gottlieb & Calderón, forthcoming). UDL is meant to increase students' access to and engagement in instructional materials. Interestingly, the research suggests that it also assists teachers in maintaining high achievement expectations for all students (King-Sears, 2014).

In essence, UDL welcomes a multimodal pedagogy that acknowledges the uniqueness of each student in terms of their linguistic, racial, ethnic, religious, socioeconomic, cultural, and physical diversity (Kleinfeld, 2019); in appreciation of this heterogeneity, viable instructional choices are offered to highlight student assets. As multimodalities exemplify UDL, multilingual learners with identified disabilities are also advantaged by these pedagogies that are enhanced through accessibility and accommodations. Table 6 displays the three UDL principles and an example literacy task for multilingual learners and multilingual learners with identified disabilities.

Table 6

Multimodal Representation Across Principles of Universal Design for Learning

UDL Principle	Multiple Means of Engagement	Multiple Means of Representation	Multiple Means of Action/Expression
Intent	Stimulate learning using a variety of avenues and materials	Support multimodal ways of showing understanding	Demonstrate learning through various communication channels
Example literacy-related tasks for multilingual learners and multilingual learners with named disabilities	Explore topics of interest through podcasts, videos, photo montages, or text in one or more languages	Create posters, co-construct displays with audio, or plan multimedia presentations	Craft graphic organizers and use the information to propose an infographic or campaign for designing a school/community mural or website

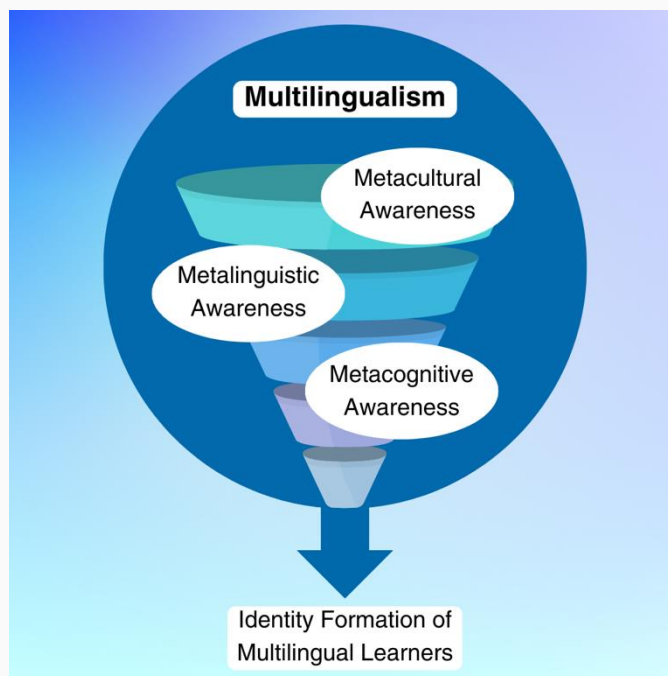
Facets of Multilingualism in Multiliteracy Practices

Research has long substantiated the positive cross-linguistic transfer of literacy knowledge and skills from language to language, including phonological awareness, syntactic awareness, and awareness of genres (Cummins, 2017; Thonis, 1983). Encouraging bilingualism and

biliteracy development while promoting dual language and bilingual education goals can inspire multilingual learners to use their full language capabilities in immersive learning experiences. As shown in Figure 4, multilingualism as a function of multiliteracies, influences the building of multilingual learners' cognitive, linguistic, and cultural awareness that together help shape student identities.

Figure 4

Multilingualism and Multiliteracies: Influences on Multilingual Learners' Identity Formation Through Metacognitive, Metalinguistic, and Metacultural Awareness



Multilingualism as an Expression of Metacognitive, Metalinguistic, and Metacultural Awareness

Multilingual awareness, comprising metalinguistic and cross-linguistic awareness, is

central to multilingual learners' cognitive development (Jessner & Allgäuer-Hackl, 2022). Multilingual classroom practices facilitate multilingual learners' access to identity positions of expertise, increasing their literacy investment, literacy engagement, and learning (Ntelioglou et al., 2014). Multilingual learners' cognitive, linguistic, and cultural awareness, as illustrated in Table 7, work in tandem to contribute to their multilingualism.

Table 7

Features of Metacognitive, Metalinguistic, and Metacultural Awareness as Functions of Multilingualism

<i>Metacognitive Awareness</i>	<i>Metalinguistic Awareness</i>	<i>Metacultural Awareness</i>
<ul style="list-style-type: none"> ▶ Processing one's thoughts and feelings in one or more languages 	<ul style="list-style-type: none"> ● Consciously reflecting on the nature of language 	<ul style="list-style-type: none"> ❖ Consciously reflecting on the influence of culture
<ul style="list-style-type: none"> ▶ Understanding one's use of learning strategies 	<ul style="list-style-type: none"> ● Making comparisons between/among languages 	<ul style="list-style-type: none"> ❖ Analyzing one's navigation among cultures
<ul style="list-style-type: none"> ▶ Acting on one's personal interaction with cognition, language, and culture 	<ul style="list-style-type: none"> ● Transferring linguistic knowledge across languages 	<ul style="list-style-type: none"> ❖ Transferring and embedding cultural knowledge across contexts and perspectives

Metacognitive Awareness

When students reflect on their learning, they gain control over their thought processes and become metacognitively aware, cognizant of their own thinking and strategies. Research findings from the Education Endowment Foundation (2021) on metacognition and self-regulated learning suggest that teaching metacognitive strategies in conjunction with subject area content yield favorable results. Converging evidence is emerging that multilingualism affects a broad network of brain regions, including primary language(s), that are involved in higher-level cognitive control (Sun & Zhang, 2019). As multilingual learners have the availability of multiple languages in which to think, their metacognitive awareness can appear before, during, and after a learning experience. Teachers, in turn, can use a range of metacognitive strategies to capture multilingual learners' thoughts and chronicle their learning. Whereas metacognition is universal, with thought mediated by one or multiple languages, multilingual learners have the added benefits of being metalinguistic and metaculturally aware.

Becoming metacognitively aware is important for all students. Multilingual learners' exposure to multiple languages and cultures gives them the advantage of gaining deep metalinguistic and metacultural awareness.

Metalinguistic Awareness

Integral to the linguistic repertoire of multilingual learners is their access to and often reliance on two or more languages, their ability to reflect on the nature of language, and the subsequent meaning from the interaction between languages. That, in essence, constitutes metalinguistic awareness. However, literacy practices in U.S. schools are generally tied to one language, English, without consideration of the linguistic capital of multilingual learners (Jessner et al., 2021). As shown in Table 8, creating conscious connections between languages across dimensions builds students' metalinguistic awareness as part of their multiliteracy development.

Table 8

Evidence for Language Learning: Building Metalinguistic Awareness in Spanish/English through Linguistic Analysis across the Dimensions of Language

<i>Dimension of Linguistic Analysis Between Languages</i>	<i>Examples for Spanish/English</i>
Phonological: sounds (phonemes)	Silent letters (e.g., <i>h</i> in <i>hoja</i> v. <i>weigh</i>); acute accent marks (<i>esta</i> v. <i>está</i>) that change word meaning
Morphological: meaning-bearing elements of language (morphemes)	Affixes (e.g., <i>pre</i>); cognates (e.g., <i>hospital</i>); false cognates (e.g., <i>éxito</i> , meaning success)
Syntactic: meaning of forms or structures of language (grammar)	Use of possessives (e.g., “el perro de Mari” “Mari’s dog”); prepositions (e.g., “son las dos de la mañana” or “it is two in the morning”)
Semantic: patterns of meaning (discourse)	Collocations; idioms (e.g., “está lloviendo a cántaros” or “it’s raining cats and dogs”)
Pragmatic: language use in context	Use of gestures; turn-taking
Translanguaging: the natural flow between languages	iH’jito, be careful!

The multilingual learner in the following excerpt expresses the benefits of being metalinguistically aware and how knowledge of two languages is advantageous to literacy development.

‘When I am allowed to use Urdu in class it helps me because when I write in Urdu and then I look at Urdu words and English comes in my mind. So, its help me a lot. When I write in English, Urdu comes in my mind. When I read in English I say it in Urdu in my mind. When I read in Urdu I feel very comfortable because I can understand it.’ (as cited in Cummins, 2017, p. 109).

Translanguaging

Translanguaging, the natural dynamic flow and interweaving of named languages among bilingual and multilingual individuals, is an extension of multiliteracies as it reinforces the value of languages and cultures and legitimizes students’ language use. Translanguaging positions bilingual and multilingual practices as the norm where multilingual learners draw from a unitary language system rather than two autonomous ones (Otheguy et al., 2015). In a translanguaging pedagogical design, teachers set up affordances, including a range of multilingual and multimodal resources, for multilingual learners to (co)construct meaning from their learning experiences.

Translanguaging is an expression of one’s idiolect, a person’s unique language practices;

thus, it disrupts the notion that teachers are the sole bearers and transmitters of knowledge. By being agentive in nature, translanguaging can fulfill cognitive-conceptual, planning-organizational, affective-social, and linguistic-discursive functions (Rajendram, 2019). Creating translanguaging spaces in schools and classrooms calls for educators to consider multilingual learners’ ways of knowing and using their full linguistic resources as valid contributions to the learning community. When multilingual learners have control and ownership over their ways of translanguaging, it illustrates their personal empowerment, where teachers facilitate student agency as part of their pedagogical practice (Castro & Gottlieb, 2021).

In translanguaging classrooms, multilingual learners draw from their linguistic repertoires to create meaning from text (and other multimodal resources) rather than being constrained by a single language (García et al., 2017; Hornberger, 2003). Influenced by culture and context, multimodal literacy and biliteracy opportunities emerge from multilingual learners’ exploration of content in multiple languages and their interactions with peers in their shared languages. As illustrated in Table 9, translanguaging is a natural course of action for multilingual learners who follow various pathways in their development of multiliteracies and multilingualism.

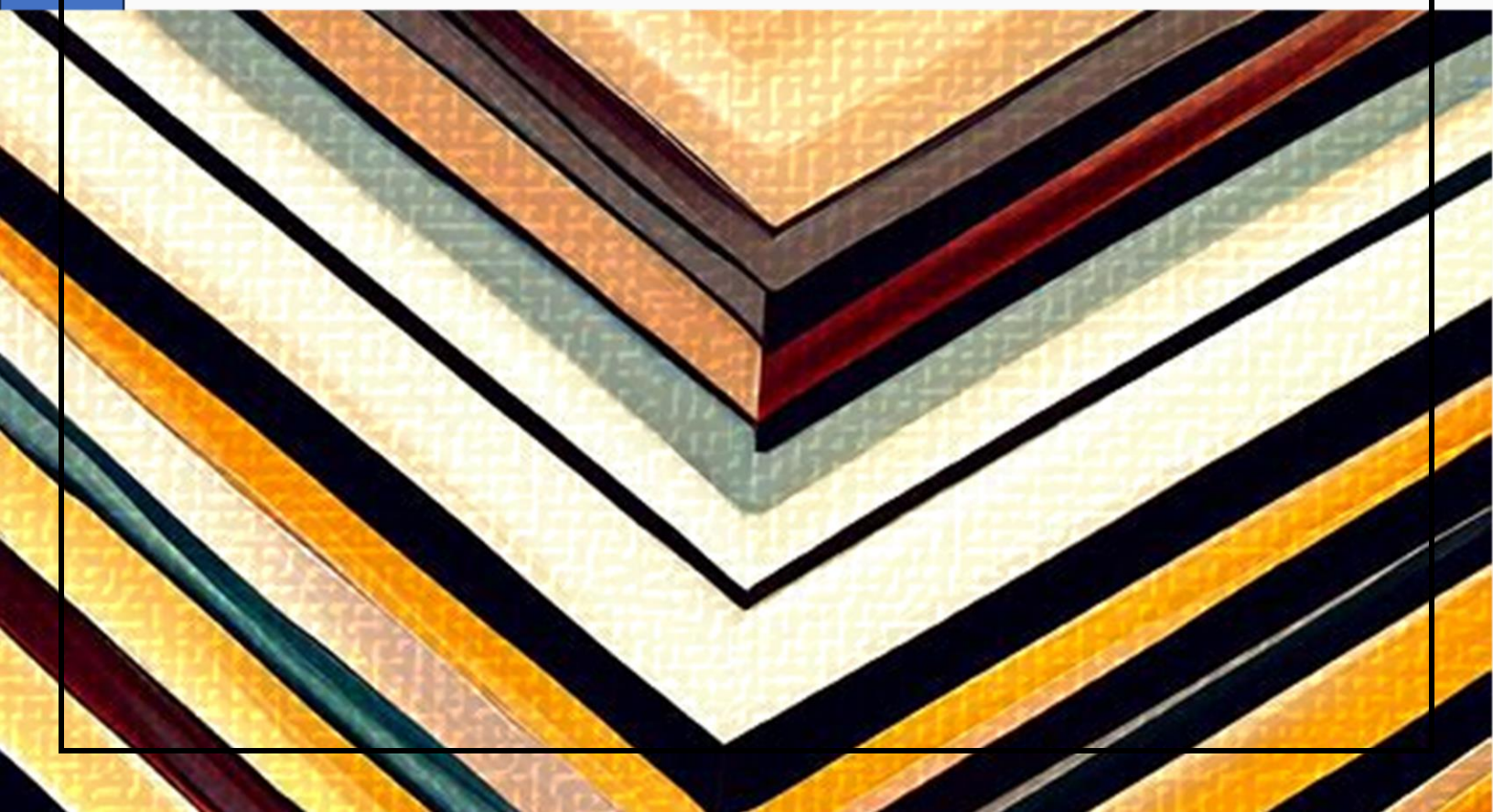


Table 9

Ideas for Stimulating Translanguaging Practices as a Function of Multiliteracy Development

<i>Teachers' Instructional Moves</i>	<i>Multilingual Learners' Opportunities to Translanguage as Part of Their Multiliteracy Development</i>
Craft learning goals and targets attainable through multiple languages, including the use of translanguaging.	Co-plan with teachers to generate ideas for offering evidence in one or more languages using technology and translanguaging as applicable.
Invite multilingual learners to use online resources in multiple languages in their pursuit of learning goals and targets.	Use multilingual websites and multimodal research tools, such as bilingual videos and podcasts, to explore content and language.
Offer multimodal means of learning, including language choice, to students.	Provide multimodal evidence for learning, such as coupling text with audio recordings, inclusive of translanguaging.
Promote student interaction in multiple languages during discussions.	Create mental models using two languages in tandem with bilingual criteria for success.
Pair students with a shared language to reflect on literacy, language, and learning.	Engage in interactive peer assessment where translanguaging helps deepen learning.
Select multicultural literature with embedded translanguaging for analysis (e.g., <i>Summer of the Mariposa</i> by García McCall)	Offer translanguaging options in responding to literature (e.g., comparing languages, injecting emotions) within specific contexts.

Adapted from Gottlieb, 2023

Metacultural Awareness

With every change of situation or context, multilingual learners navigate multiple cultures. Culture is so pervasive in our lives that we might refer to its fluidity as transculturalism. In school, transculturalism can be seen as an ideology that works in tandem with multiliteracies and discourse in forming a language arts framework (WIDA, 2021). In the classroom, transculturalism opens the door for students to explore, discuss, argue, and defend different cultural stances to further their (multi)literacy development and grow their personal identities (Aguirre & Muñoz, 2021).

To cultivate our students' metacultural awareness, educators must be conscious of how to relate cultures within classrooms and make connections to home and community. The following classroom examples infuse transculturalism in boosting multiliteracy development as multilingual learners:

- Compare and contrast different cultural perspectives on issues that have a social, political, or personal impact (e.g., the use of technology)
- Identify cultural nuances, perspectives, or biases embedded in oral stories, literature, or videos
- Explain how idiomatic expressions, metaphors, or translanguaging strengthen the meaning of the text
- Discuss the cultural implications of different belief systems

In approaching multilingualism as an asset, teachers, whether multilingual or not, can increase relevance, motivation, and meaning to (multi)literacy and learning activities. Fostering multilingual learners' metalinguistic, multicultural, and metacognitive awareness adds to the richness of their multiliteracy development.

Implementing Multiliteracies: Promises and Caveats

Multilingual learners' prior knowledge is encoded in the multiple languages that serve as the backbone of their literacy development. In centering multilingual learners and shifting from a literacy lens to a multiliteracy lens, educators must:

1. Trust students and their choices, facilitating their selection of viable multimodal options for pursuing learning and showing their evidence for learning.
2. Create classroom communities of learners where students respectfully interact with each other using their full linguistic resources in conjunction with other multiliteracy activities.
3. Move from thinking about a literacy or biliteracy block of time to a multiliteracies mindset.
4. Inspire students by tapping their transcultural experiences and multilinguistic prowess (such as through translanguaging or cross-linguistic transfer) to incorporate into their multiliteracy development.
5. Accept the digitalization and interconnectedness of our world inherent in multiliteracies.

Although it has been more than a quarter century since the introduction of multiliteracies in the educational literature, it has been slow in seeping into curriculum, instruction, and assessment. We realize that with every paradigm shift comes with challenges; therefore, in applying multiliteracies to practice, we acknowledge its constraints while envisioning its potential. The following questions should evoke stimulating conversation among educators as they consider converting their reading or literacy plan into one of multiliteracies.

Digital literacies and understanding of technology, a primary dimension of multiliteracies, are requisite for instruction and assessment in today's classrooms. How can educators seamlessly integrate these innovations into instruction and assessment?

One of the greatest deterrents to incorporating multiliteracies into schooling is time for teachers to become digitally literate and proficient in communication modes other than print. The

prevalence of technology in our society means that students must have access and opportunities to engage in digital literacies, including data literacy, information literacy, visual literacy, media literacy, and meta-literacy (Gilchrist et al., 2019). Using computers (with reliable internet), tablets, digital cameras, and even 3-D printers can positively influence student learning by promoting high-quality creative thinking. Ongoing professional learning for educators around digital literacies and the increasing role of generative artificial intelligence (AI), with outreach to older students, is critical to keep pace with technological advances. Teacher partnerships with mentors, even knowledgeable older students as tutors, are powerful means of introducing and reinforcing facets of multiliteracies.

Tensions must be resolved between competing theories and pedagogies of literacy. To move forward, how can educators embrace multiliteracies for multilingual learners?

There is an expansive linguistic and cultural landscape, and as educators, it is our responsibility to tap the extensive resources that multilingual learners bring to ensure their multiliteracy development to the fullest. Multiple views of literacy can coexist, with multiliteracies building on and enhancing basic early literacy components. As educators, we must stop thinking in dichotomous ways and reframe our literacy practices so that all students become agents of their own learning. Just as multilingual learners draw from their personal experiences and inject their own values and perspectives into their multiliteracy experiences, instruction must be rich in content and language, relevant, meaningful, and authentic.

There is an ever-present controversy over the appropriacy of reading methodologies for all students, including multilingual learners. Teachers of multilingual learners, however, must be aware that research on literacy instruction in the primary language has a positive effect on multilingual learners' literacy achievement in English (August & Shanahan, 2006; Escamilla et al., 2014; Thomas & Collier, 2012). This finding underscores the importance and advantage of bilingualism and multilingualism in multilingual

learners' (multi)literacy development, irrespective of the pedagogy.

A schoolwide commitment to linguistic and cultural sustainability must be evident in multimodal multiliteracy instruction and assessment for multilingual learners. How can educators reach a consensus on the value and implementation of multiliteracies?

An off-the-shelf reading program frequently fails to encompass the interests, histories, or understandings of multilingual learners and other minoritized students. It does not highlight the strengths of the students' languages and cultures, nor does it reflect the local context. By limiting the representation of multimodalities in text-based materials, we tend to inhibit meaningful engagement and reduce optimal learning opportunities for multilingual learners.

A set literacy or reading curriculum may be firmly entrenched in a school or district; however, it does not preclude educators from embedding a strengths-based perspective where learning goals are linked to specific actions that activate students' assets. The design of linguistic and culturally relevant curricular projects, products, or performances offers multilingual learners multimodal multilingual options to personalize learning (Hilliard & Gottlieb, 2021). By injecting UDL to stimulate student engagement, we can convert literacy liabilities into multiliteracy strengths within linguistic and culturally sustainable classrooms to ensure the valuing and maintenance of 'linguistic, literate, and cultural pluralism' (Paris, 2012).

With technology and digital tools becoming increasingly inclusive of multilingual learners' assets, multiliteracies has emerged as a viable means of seeking meaning and communicating that meaning during learning. We have explored how multiliteracies has expanded our definition of literacy from traditional print-dependent views to include digital ones, how incorporating multimodalities has promoted a broader vision of meaning-making systems (e.g., through visual, graphic, and musical representations), and how multilingualism/transculturalism has illuminated and expanded modes of

communication for multilingual learners in school and beyond.

Collaboration among communities and educators can lead to creative solutions to perplexing dilemmas. Multiliteracies invites educators to join in discussions to accept and promote bilingualism, multilingualism, and transculturalism as underlying resources to be leveraged for multilingual learners. In doing so, multilingual learners are advantaged in learning through the richness of multiliteracies as they navigate, comprehend, and interpret the world. Ultimately, multiliteracies, by underscoring linguistic and cultural wealth of students alongside evolving technologies, is a powerful antidote for the more prevalent unidimensional monoglossic views of literacy that historically have been cast upon multilingual learners. A multiliteracies approach to teaching and learning has the potential and promise to empower multilingual learners and their teachers while contributing to our increasingly technology-dependent lives.

Addendum: Multiliteracies for Multilingual Learners: An Antidote to the Science of Reading

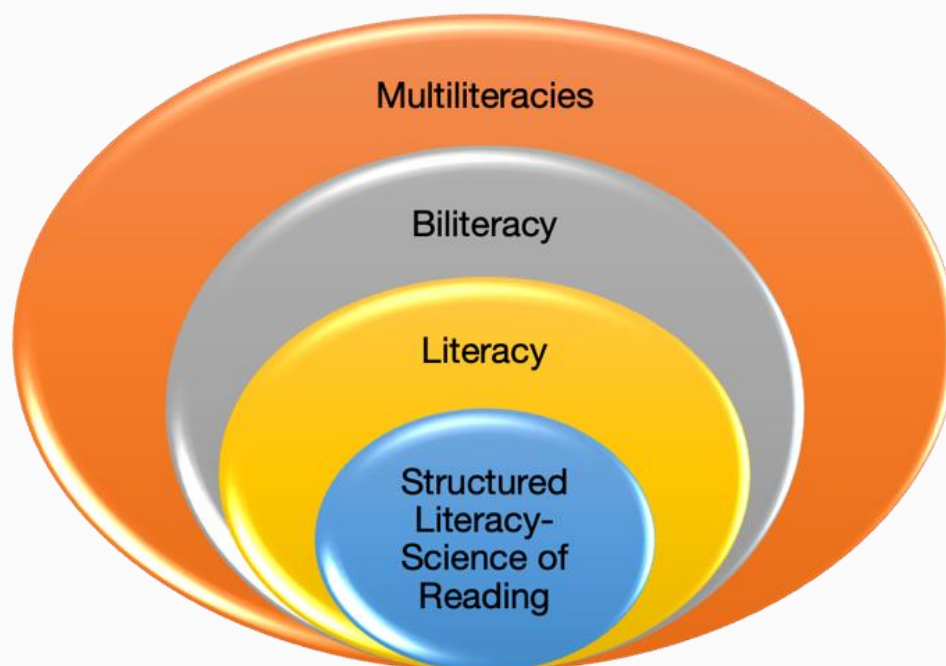
Enriching experiences that center multilingual learners within multimodal technologically enhanced environments support the expansion of literacy to *multiliteracies* (The New London Group, 1996). Offering these increased prospects for multilingual learners to access their linguistic and cultural resources opens greater options and pathways to achieve their learning aspirations (García & Kleifgen, 2019). The foundation of multiliteracies is *literacy* and *biliteracy* which encompasses oral language, reading, and writing development in one or more languages. In turn, within *reading*, we uncover a narrower interpretation in structured literacy, manifested in the Science of Reading, that focuses on five pillars- phonemic awareness, phonics, fluency, vocabulary, and comprehension- put forth in the 2000 National Reading Panel report.

What is proposed in this position paper is not to reject the premises behind structured literacy, basic literacy, the simple view of literacy, or the Science of Reading (SoR) but to encapsulate these views within a broader, more profound vision of multiliteracies and its desired educational goal- to empower multilingual learners to manage their own learning by transforming their literacies experiences. Figure 5 visualizes this hierarchical relationship among

multiliteracies, biliteracy, literacy, and structured literacy as equated with the Science of Reading.

Figure 5

The Nesting of the Structured Literacy Within Literacy, Biliteracy, and Multiliteracies



Contrasts in Literacy-related Research

In their meta-analysis, the National Literacy Panel on Language-Minority Children and Youth (August & Shanahan, 2006) and an Institute of Education Sciences (IES) national study on the early reading development of English learners by AIR (Park, et al., 2022) conclude that building strong foundational reading skills is important but not sufficient for students' overall reading and literacy development. The 2006 Panel specifies that English Learners' home language(s), bilingual brains, background knowledge, and oracy also contribute to their literacy development.

The meta-analysis from this highly regarded research establishes that young English Learners (the term in the reports) advance along the early literacy continuum from year to year, most likely without structured literacy associated with the Science of Reading. Moreover, results from the AIR study show that (with parenthesis added):

- “English learners in general began kindergarten with lower reading skills

(remember that 1.) these students, by definition, qualify for language support and may never have been exposed to English prior to school and 2.) the measurement of early literacy almost always occurs exclusively in English).

- By the end of first grade, most students acquired foundational reading skills.
- Most EL students acquired alphabetic principle skills by the end of first grade.
- By the end of second grade, almost all students seemed to acquire foundational skills necessary for decoding, and most EL students acquired phonological awareness skills' (Park et al., 2022).

These conclusions underscore ample literacy progress for English learners in English irrespective of the reading-related approach or language(s) of instruction. Expanding these and other multilingual learners' opportunities for literacy development in additional languages instantiates the benefits of multilingualism—sociocultural, conceptual, psychological,

cognitive, and economic (OELA, 2020). As multiliteracies is more inclusive of sociocultural contexts, it better prepares multilingual learners to face and interact with multimodalities, including present-day technology and translanguaging pedagogies.

The rationale for adopting a multiliteracy stance stems from the continuous growth of the multilingual student population in K-12 settings, most recently attributed to U.S. border crossings and international conflicts, along with the explosion of technology worldwide, as seen most recently in the eruption of generative artificial intelligence. Whether acknowledged or not, multiliteracies is advancing and will continue to gain more prominence in the educational landscape. In contrast, concurrently, the national vision of what constitutes effective literacy practices is becoming more restrictive to the basic components of reading and narrower in scope as states and districts elect to join the Science of Reading movement. How might we reconcile this contradiction of how to approach literacy development, especially for young multilingual learners? In examining these constructs, we unveil stark distinctions.

The theoretical foundation of the Science of Reading, or Structured Literacy, is structuralism and cognitive psychology. It seeks to understand mental processes through segmentation or the dissection of constructs into their parts. For example, segmentation in reading, critical for phonemic awareness, refers to identifying a word's individual sounds or phonemes. Structured literacy, coined by the International Dyslexia Association (IDA), is characterized by highly explicit, systematic instruction of foundational and higher-level literacy skills.

Research on the Science of Reading seems to stem from the cognitive neuroscience of dyslexia, and its educational roots tend to appear in the screening for and identification of students with dyslexia. The IDA defines dyslexia as 'a specific learning disability that is neurobiological in origin. It is characterized by difficulties with accurate and/or fluent word recognition and by poor spelling and decoding abilities. These difficulties typically result from a

deficit in the phonological component of language that is often unexpected in relation to other cognitive abilities and the provision of effective classroom instruction' (see <https://bit.ly/3MHWVmU>).

In contrast to imposing the Science of Reading on all students as the baseline for designing literacy experiences for students, decades of research on the optimal pathway for multilingual learners participating in language programs points to one of biliteracy development (Hopewell & Escamilla, 2014; Thomas & Collier, 2012 among others). True, there are those within the Science of Reading community who support bilingualism as a cognitive strength that can boost biliteracy (Amplify Staff, 2023). There are other scholars, however, who claim that literacy for multilingual learners with its strong research base is multidimensional rather than unidimensional in that it is:

- ❖ as much a social activity as a cognitive process
- ❖ inclusive of cross-linguistic transfer, oracy, and comprehension
- ❖ grounded in an array of methodologies (Herrera & de Jong, 2023).

iColorín Colorado!, a bilingual website for educators and families, defines biliteracy as 'the ability to effectively communicate or understand written thoughts and ideas through the grammatical systems, vocabularies, and written symbols of two different languages' (see <https://bit.ly/3qTuJ8t>). Hornberger (1990) has a more generalized view, defining biliteracy as 'any and all instances in which communication occurs in two (or more) languages in or around writing.' Although biliteracy is not the goal of all language programs, multilingual learners are, by definition, continuously exposed to more than one language and culture, and these assets, whether nurtured or not, influence the students' literacy development. Table 10 contrasts the views of early literacy practices through the lens of dyslexia, as perceived in the Science of Reading, and those of multilingual language and biliteracy practices.

Table 10

Contrasting Dyslexia, the Grounding for the Science of Reading, and Biliteracy Development

<i>Dyslexia</i>	<i>Biliteracy</i>
<ul style="list-style-type: none"> • Defined in deficit terms based on difficulties and needed ‘interventions’ • Generally confined to a monoglossic orientation • Applied to a possible specific neurobiological disorder in all students • Centered on components of phonological awareness • Presented as an isolated set of skills associated with beginning readers • Diagnosed based on a constellation of discrete variables or skills • Related to decontextualized teaching practices • Determined by measures in English 	<ul style="list-style-type: none"> • Defined in additive assets-based language • Represented by a heteroglossic orientation • Applied to the normal development of multilingual learners • Centered on language in its totality- phonology, morphology, syntax, and semantics • Presented as a meaning-making process throughout students’ development • Composed of modes of communication that constitute one’s linguistic repertoire • Related to contextualized teaching practices • Determined by measures in multiple languages

Making Sense of the Numbers

In the 2019–20 school year, the number of students identified as English Learners (ELs) in K-12 public schools was 5,115,887, or about 10 percent of the total school population (U.S. Department of Education, 2023). This statistic represents only those multilingual learners participating in language education programs. In addition, there are exited English Learners, multilingual learners who, according to their state criteria, no longer qualify for language support; the total number of former English Learners in the same 2018–19 school year was 1,857,779 (U.S. Department of Education, 2023). In addition to these almost 7 million multilingual learners, there are innumerable heritage language learners or never identified English Learners who have been exposed to multiple languages and cultures, including indigenous communities, within their home environment. In 2021, in total, more than 11.5 million, or approximately 21 percent of children ages 5 to 17, spoke a language other than English at home (Kids Count Data Center, 2022).

Although there are no comparable statistics, the IES National Center for Education Statistics (NCES) has stated that ‘in 2020–21, the number of students ages 3–21 who received special education services under the Individuals with Disabilities Education Act (IDEA) was 7.2 million, or 15 percent of all public-school students. Among students receiving special

education services, the most common category of disability was specific learning disabilities at 33 percent (see <https://bit.ly/45tSG5l>). As dyslexia, the root cause for justifying the Science of Reading, is considered a specific learning disability, the upper-end estimate of students (if all ‘specific learning disabilities’ were to be assigned to dyslexia) would be 2.4 million students- less than half the number of identified ‘English learners’ and about ten percent of the total number of multilingual learners.

These statistics underscore the overwhelming presence of multilingual learners in relation to the number of students with dyslexia, some of whom are also multilingual learners, in public elementary and secondary schools. The conclusion from these relational data is that given the more significant presence of multilingual learners, the body of research on biliteracy and multiliteracies should be considered equally, if not more, robust and impactful than that of dyslexia on students’ literacy development.

Although the numbers tell a different story, the insistence on structured reading as the sole course of pursuing early literacy currently prevails. Rather, emphasis should be placed on the interaction between language and literacy development, its different contexts, and related empirical research. Learning requires more than cognitive engagement; it is a social and culturally mediated activity with interaction at

its heart- interaction between students and teachers, students with each other, students with family members, and students with all types of texts (Bates, 2019; Nagel, 2012).

The Impact of Federal and State Legislation

Within the last decade, 32 states and the District of Columbia have codified principles and practices of the Science of Reading into legislation (Schwartz, 2023). This blanket legislation largely requires all students in primary grades to be taught explicit phonics and systematic decoding to the exclusion of other methodologies, mandates districts to purchase aligned curriculum, and targets professional learning (and teacher preparation) on structured literacy practices. In addition, many of these bills ban schools from using the more meaning-based ‘three cueing system’—drawing from semantics (word and sentence meaning), syntax (grammatical features in context), and graphophonic (letters and sounds) frameworks as a model of reading.

In contrast, federal legislation is the primary source of state language policy that addresses literacy for multilingual learners. With its origins stemming from the Elementary and Secondary School Act (ESEA) of 1965, the latest reauthorization being in 2015, this civil rights bill defines English learners (the legal term) and names the subsets of those students who are part of state accountability systems. An analysis of state websites reveals that 18 states rely exclusively on federal guidance under Title III for their language education policy; the remaining states have substantive guidance stipulated by individual statutory mandates and regulations (Gottlieb et al., 2020).

So why is there a debate surrounding the Science of Reading for students and families who participate in ESEA Titles I and III, the primary funding source for English Learners, when there are already federal and state guidelines in place

and a history of effective language programs? After all, one of the purposes of Title III is ‘to assist all English learners, including immigrant children and youth, to achieve at high levels in academic subjects so that all English learners can meet the same challenging State academic standards that all children are expected to meet’ (see <https://bit.ly/3OW7O4w>). Not only is there federal backing, a substantial body of research and evidence also underscores positive identification of multilingual learners who participate in these programs (Cummins, 1996; Jacob et al., 2022).

Revisiting Testing and Assessment

Comparisons cannot and should never be made between the interpretation of test results based on the discrete components of the Science of Reading and the more holistic ones of multiliteracies. Case in point, there are 44 phonemes or sounds in English. If a student initially recognizes ten sounds and then several months later, the same student identifies 20 sounds, that can be interpreted as a huge gain. Still, what do those numbers mean about a student’s literacy development? Multilingual literacy development, couched within multiliteracies, is a completely different construct that entails capturing multilingual learners’ entire linguistic repertoire; assessment must follow suit (Gorter & Cenoz, 2017). The interpretation of data generated from assessment requires an understanding of the purpose, audience, and context of a communication and the characteristics of the multilingual learner.

Notwithstanding, one of the intents of testing is to screen students and potentially identify those who qualify for different types of support services. Both the Science of Reading and state language proficiency tools have such screening measures, albeit for different purposes. That is where the similarity ends. Table 11 differentiates features of screening for dyslexia versus that for language proficiency.

Table 11

Comparing Dyslexia Screening and Language Proficiency Screening

<i>Dyslexia Screening</i>	<i>Language Proficiency Screening</i>
<ul style="list-style-type: none"> • Tests individual reading-related skills and subskills • Labels students as potentially dyslexic irrespective of their backgrounds • Serves as a pre-diagnosis of dyslexia 	<ul style="list-style-type: none"> • Tests four language domains- listening, speaking, reading, and writing or a combination of modes • Classifies whether multilingual learners are potentially English learners and qualify or not for language services • Determines an overall level of language proficiency

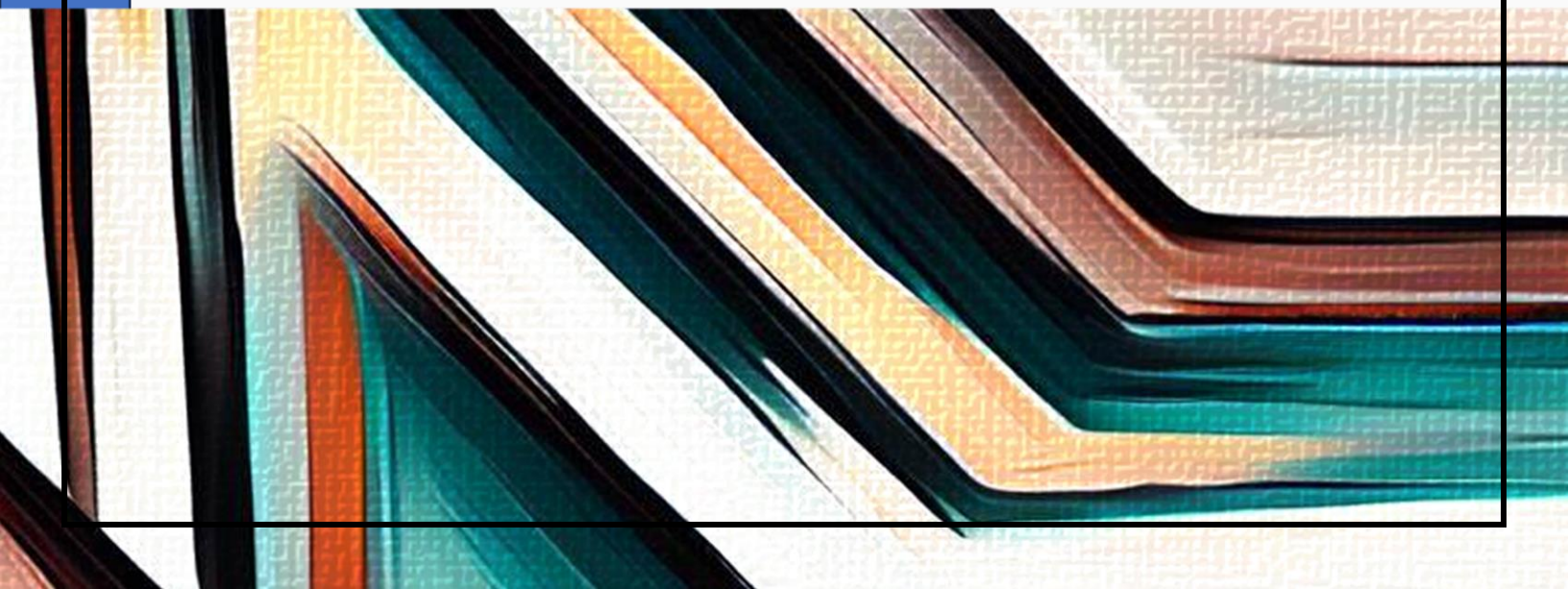
It has long been articulated that multilinguals cannot be judged by the standards and performance of monolinguals (Cook, 2013; Grosjean, 2010; Valdés & Figueroa, 1994). The literature recommends replacing traditional monoglossic approaches to assessment with holistic multilingual assessment to have a truer representation of multilingual learners (Gorter & Cenoz, 2017; Shohamy, 2011). This shift from language isolation in assessment to holistic approaches respects language-as-resource rather than as a potential problem (Ruíz, 1984).

Language policy and assessment within the Science of Reading, in large part, are monoglossic, where data are collected, analyzed, and reported from a monolingual lens, English. Biliteracy and multiliteracy instruction and attainment, no matter the philosophy or pedagogical approach, is heteroglossic in orientation and, although complex, benefits multilingual learners (Lü, 2020; Ríos & Castellón, 2018; Thomas & Collier, 2003 among others). As an educational community, we cannot afford to deconstruct multiliteracies into

biliteracy and further dismantle literacy to focus only on structured literacy if we want multilingual learners to thrive in a linguistically exquisite, technologically driven world.

Conclusion

As a nation, if we are to invest in literacy education, our resources should be devoted to children and youth, not a movement. We suggest that the tenets of the Science of Reading be presented within an overall literacy campaign that honors and promotes the development of multilingual learners. In that way, we could take a more inclusive, asset-based, and equitable stance for all students. In leveraging the hallmarks of multiliteracies—the escalating influence of technology and the incorporation of multilingual learners’ linguistic, cultural, and experiential expertise into school life—we can harness our students’ strengths to advance their literacy, biliteracy, and ultimately, multiliteracies right from the start.



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About the Publication, Author, and Publisher

Publication

This publication is an adaptation and extension of a chapter in the upcoming 2024 Gottlieb book *Assessing Multilingual Learners: Bridges to Empowerment* (3rd ed.), Corwin. The ideas expressed herein are solely those of the author.

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